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Result
No.
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Maximum Match 100%
Listing first 45 summaries
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Minimum DB seq length: 0
Maximum DB seq length: 200000000
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Scoring table:
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Perfect score:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             OM protein - protein search, using sw model
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           on:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Score
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Match Length DB
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              March 4, 2005, 11:05:21; Search time 42 Seconds (without alignments) 76.426 Million cell updates/sec
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               513545 seqs, 74649064 residues
        Gapop 10.0 , Gapext 0.5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  1 GGGGWGQGGSHSQWNKPSKP.....NMKHVAGAAAGAVVGGLGGY
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          GenCore version 5.1.6 Copyright (c) 1993 - 2005 Compugen Ltd
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          /cgn2_6/ptcdata/1/iaa/5A_COMB.pep:*
/cgn2_6/ptcdata/1/iaa/5B_COMB.pep:*
/cgn2_6/ptcdata/1/iaa/6B_COMB.pep:*
/cgn2_6/ptcdata/1/iaa/6B_COMB.pep:*
/cgn2_6/ptcdata/1/iaa/PCTUS_COMB.pep:*
/cgn2_6/ptcdata/1/iaa/backfiles1.pep:*
                                                             US-08-242-188-4
US-08-650-626-10
US-08-692-892-4
US-08-691-33-9A-4
US-08-68-162A-24
US-09-031-168-10
US-09-691-168-10
US-09-69-316C-10
US-09-69-316C-10
US-09-69-316C-10
US-09-431-887-25
US-09-431-887-25
US-09-431-887-25
US-09-431-887-28
US-09-431-887-28
US-09-380-0158-2
US-09-380-0158-3
US-08-60-626-9
US-08-692-892-3
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Sequence 4, Appli
Sequence 10, Appli
Sequence 10, Appli
Sequence 24, Appli
Sequence 24, Appli
Sequence 24, Appli
Sequence 4, Appli
Sequence 4, Appli
Sequence 10, Appli
Sequence 10, Appli
Sequence 22, Appli
Sequence 25, Appli
Sequence 28, Appli
Sequence 3, Appli
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29 209 85.7 264 3 US-09-823-494-21 30 209 85.7 264 4 US-09-627-2188-11 31 207 84.8 256 4 US-09-431-887-26 32 203 83.2 264 4 US-09-431-887-27 33 196.5 80.5 252 4 US-09-431-887-27 34 195.5 80.1 257 4 US-09-431-887-29 35 194 79.5 264 4 US-09-431-887-29 36 193.5 79.3 253 1 US-08-242-188-2 37 193.5 79.3 253 1 US-08-60-626-8 39 193.5 79.3 253 1 US-08-60-626-8 39 193.5 79.3 253 1 US-08-60-26-8 40 193.5 79.3 253 1 US-08-60-22-892-2 41 193.5 79.3 253 2 US-08-60-133-934-2 42 193.5 79.3 253 3 US-09-031-168-8 43 193.5 79.3 253 3 US-09-031-168-8 44 193.5 79.3 253 3 US-09-031-62A-22 45 193.5 79.3 253 3 US-09-031-63-79-2 46 193.5 79.3 253 3 US-09-031-659-20 47 193.5 79.3 253 3 US-09-031-659-20 48 193.5 79.3 253 3 US-09-031-659-20	209 85.7 264 3 US 209 85.7 264 4 US 207 84.8 256 4 US 203 83.2 264 4 US 195.5 80.5 252 4 US 194.5 79.3 253 1 US 193.5 79.3 253 2 US 193.5 79.3 253 2 US 193.5 79.3 253 3 US
85.7 264 4 US 84.8 252 4 US 80.5 252 4 US 80.1 257 4 US 79.3 253 1 US 79.3 253 1 US 79.3 253 1 US 79.3 253 2 US 79.3 253 3 US 79.3 253 3 US 79.3 253 3 US	85.7 264 3 US-09-823-494-21 Sequence 84.8 256 4 US-09-627-218B-11 Sequence 84.8 256 4 US-09-627-218B-11 Sequence 83.2 264 4 US-09-431-887-26 Sequence 83.2 264 4 US-09-431-887-27 Sequence 80.5 254 4 US-09-431-887-13 Sequence 79.3 253 1 US-09-431-887-29 Sequence 79.3 253 1 US-08-242-188-2 Sequence 79.3 253 1 US-08-626-8 Sequence 79.3 253 1 US-08-692-892-2 Sequence 79.3 253 2 US-08-692-892-2 Sequence 79.3 253 2 US-08-692-892-2 Sequence 79.3 253 2 US-08-692-892-2 Sequence 79.3 253 3 US-09-031-168-8 Sequence 79.3 253 3 US-09-031-168-8 Sequence 79.3 253 3 US-09-031-68-8 Sequence 79.3 253 3 US-09-036-57-9 Sequence 8-9-036-8-9
264 4 US 256 4 4 US 256 4 4 US 257 4 US 257 4 US 253 1 US 253 1 US 253 2 US 253 3 US 253 3 US 253 3 US	264 3 US-09-823-494-21 Sequence 264 4 US-09-627-218B-11 Sequence 256 4 US-09-431-887-26 Sequence 264 4 US-09-431-887-27 Sequence 264 4 US-09-431-887-27 Sequence 252 4 US-09-431-887-29 Sequence 253 4 US-09-431-887-29 Sequence 253 1 US-08-431-887-2 Sequence 253 1 US-08-242-188-2 Sequence 253 1 US-08-60-626-8 Sequence 253 1 US-08-60-626-8 Sequence 253 1 US-08-692-892-2 Sequence 253 2 US-08-691-887-20 Sequence 253 2 US-08-692-892-2 Sequence 253 3 US-09-031-168-8 Sequence 253 3 US-09-031-998-2 Sequence 253 3 US-09-031-998-2 Sequence 253 3 US-09-128-450-20 Sequence
3 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3 3	3 US-09-823-494-21 Sequence 4 US-09-427-218B-11 Sequence 4 US-09-431-887-26 Sequence 6 US-09-431-887-27 Sequence 6 US-09-431-887-27 Sequence 7 US-09-431-887-29 Sequence 8 US-09-431-887-29 Sequence 8 US-09-431-887-29 Sequence 8 US-09-431-887-29 Sequence 9 US-08-242-188-2 Sequence 1 US-08-69-261A-2 Sequence 1 US-08-69-283-2 1 US-08-692-892-2 Sequence 2 US-08-692-892-2 Sequence 2 US-08-691-188-8 Sequence 3 US-09-031-188-8 Sequence 3 US-09-031-188-8 Sequence 3 US-09-031-188-8 Sequence 9 US-09-031-188-8 Sequence 1 US-08-692-892-2 Sequence 1 US-08-693-494-20 Sequence 1 US-08-9823-494-20 Sequence
3 US-09-823-494-21 4 US-09-627-218B-11 4 US-09-431-887-26 4 US-09-431-887-27 4 US-09-431-887-29 4 US-09-431-887-29 4 US-09-431-887-24 1 US-08-242-188-2 1 US-08-69-261A-2 1 US-08-69-261A-2 1 US-08-692-892-2 2 US-08-692-892-2 2 US-08-691-68-8 2 US-08-692-892-2 3 US-09-031-168-8 3 US-09-128-450-20 3 US-09-128-450-20 3 US-09-128-450-20	-09-823-494-21 Sequence -09-437-2188-11 Sequence -09-431-887-26 Sequence -09-431-887-27 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -08-509-261A-2 Sequence -08-60-626-8 Sequence -08-692-892-2 Sequence -08-692-892-2 Sequence -08-691-188-8 Sequence -09-031-188-8 Sequence -09-036-579-2 Sequence -09-036-579-2 Sequence -09-036-579-2 Sequence
US-09-823-494-21 US-09-627-218B-11 US-09-411-887-26 US-09-431-887-27 US-09-431-887-29 US-09-431-887-24 US-09-431-887-24 US-08-626-8 US-08-626-8 US-08-626-8 US-08-692-892-2 US-08-692-892-2 US-08-693-86-86-80 US-08-693-86-80 US-08-695-822 US-08-695-823-494-20	-09-823-494-21 Sequence -09-627-2188-11 Sequence -09-431-887-26 Sequence -09-431-887-27 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-29 Sequence -09-431-887-2 Sequence -08-242-188-2 Sequence -08-50-2618-2 Sequence -08-60-626-8 Sequence -08-692-892-2 Sequence -08-692-893-2 Sequence -08-1188-8 Sequence -09-031-168-8 Sequence -09-036-579-2 Sequence -09-036-579-2 Sequence -09-036-579-2 Sequence
	Sequence 2 Sequence 3 Sequence 3 Sequence 3 Sequence 3 Sequence 6 Sequence 6 Sequence 7

ALIGNMENTS

US-08-242-188-4

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US-08-242-188-4
                                                                                                                                                                  TELEFAX: (415) 854-0875
INFORMATION FOR SEQ ID NO: 4:
SEQUENCE CHARACTERISTICS:
LENGTH: 255 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
                                                                                                                                                                                                                                                                                                                 COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PACENTION PC-DOS/MS-DOS
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/242,188
FILING DATE: 13-MAX-1994
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Bosicevic, Karl
REGISTRATION UMMBER: 06510/014001
TELECOMMUNICATION INFORMATION:
TELEPHONE: (415) 854-5277
TELEPHONE: (415) 854-5277
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 4, Application US/08242188 Patent No. 5565186 GENERAL INFORMATION:
  Matches
                        Query Match
Best Local :
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                CORRESPONDENCE ADDRESS:
ADDRESSEE: Karl Bosicevic
STREET: 2200 Sand Hill Road
                                                                                                                            MOLECULE TYPE: peptide ORIGINAL SOURCE:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       APPLICANT: Prusiner, Stanley B.
APPLICANT: Scott, Michael R.
APPLICANT: Telling, Glenn
TITLE OF INVENTION: METHOD OF DETECTING PRIONS IN A SAMPLE
TITLE OF INVENTION: AND TRANSGENIC ANIMAL USED FOR SAME
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       NUMBER OF SEQUENCES:
                    Match 88.5%;
Local Similarity 95.5%;
                                                                                                        ORGANISM: SHEEP PRION PROTEIN, ShPrP
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  Conservative
<u>.</u>
                      Score 216; DB 1; Length 255; Pred. No. 3.9e-17;
  Mismatches
  Indels
  2
  Gaps
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RESULT 3
US-08-660-626-10
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US-08-509-261A-4
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                                                                                                                                                                         Sequence 10, Application US/08660626 Patent No. 5789655
                                                                                                                                                                                                                                                                                                                                                   Matches
                                                                                                                                                                                                                                                                                                                                                                                    Query Match
                                                                                                                                                         GENERAL INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sequence 4, Application US/08509261A Patent No. 5763244
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INFORMATION FOR SEQ ID NO: 4:
SEQUENCE CHARACTERISTICS:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           GENERAL INFORMATION:
APPLICANT: Prusiner, Stanley B.
APPLICANT: Scott, Michael R.
APPLICANT: Telling, Glenn
     APPLICANT: Stanley B. Prusiner
APPLICANT: Glenn C. Telling
APPLICANT: Fred E. Cohen
APPLICANT: Fred E. Cohen
APPLICANT: Michael R. Scott
TITLE OF INVENTION: TRANSGENIC ANIMALS EXPRESSING
TITLE OF INVENTION: EPITOPE-TAGGED PROTEINS
UNMEER OF SEQUENCES: 13
CORRESPONDENCE ADDRESS:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 NAME: Bozicevic, Karl REGISTRATION NUMBER: 28,807 REFERENCE/DOCKET NUMBER: 65 TELECOMMUNICATION INFORMATION: TELEPHONE: 650-327-3400
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           APPLICATION NUMBER: US/08/509,261A FILING DATE: 31-UUL-1995 CLASSIFICATION: 800 PRIOR APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      OPERATING SYSTEM: DOS
SOFTWARE: FRASTSEQ for Windows Version 2.0
CURRENT APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        ATTORNEY/AGENT INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                COMPUTER READABLE FORM:
MEDIUM TYPE: Diskett
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            NUMBER OF SEQUENCES: 4
CORRESPONDENCE ADDRESS:
ADDRESSEE: Bozicevic & Reed, LLP
STREET: 285 Hamilton Avenue, Suite 200
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          TITLE OF INVENTION:
                                                                                                                                                                                                                                                                                                                                                Local Similarity nes 42; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                 TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    LENGTH:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TELEFAX: 650 327-3231
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            APPLICATION NUMBER:
                                                                                                                                                                                                                                                                                88
                                                                                                                                                                                                                                                                                        1 GGGGWGQGGSHSQWNKPSKPPKTNNKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        94301
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                              255 amino acids
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Telling, Glenn
                                                                                                                                                                                                                                                                                                                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              IBM Compatible
Fish & Richardson
                                                                                                                                                                                                                                                                                                                                                              95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Method of Detecting Prions in a Sample and Transgenic
                                                                                                                                                                                                                                                                                                                                              0; Mismatches
                                                                                                                                                                                                                                                                                                                                                          Score 216; DB 1; Length 255; Pred. No. 3.9e-17;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         6510-030001
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                                                                                                                                                                                                                                                                                                                                              0,
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RESULT 4
US-08-692-892-4
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                                               COMPUTER: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patentin Release #1.0, Ve
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/692,892
FILING DATE: 30-JULY-1996
CLASSIFICATION:
ATTORNEY/AGDATE ---
                                                                                                                                                                                                                                                                                                                                                                                          GENERAL INFORMATION:
APPLICANT: Prusine:
APPLICANT: Scott, I
APPLICANT: Telling
                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 4, Application US/08692892
Patent No. 5792901
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Matches
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ZIP: 94025
ZIP: 94025
COMPUTER REALDABLE FORM:
MEDIUM TYPE: Floppy disk
MEDIUM TYPE: IBM PC compatible
TWOTTER: TOTTEM: PC-DOS/MS-DOS
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TELEPHONE: (415) 322-5070
TELEPAX: (415) 854-0875
INFORMATION FOR SEQ ID NO: 10
ATTORNEY/AGENT INFORMATION:
NAME: BOZICEVIC, KAR1
REGISTRATION NUMBER: 28,807
REFERENCE/DOCKET NUMBER: 06:
                                                                                                                                                                                    ZIP: 94025
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy
                                                                                                                                                                                                                                                                                    NUMBER OF SEQUENCES: 4
CORRESPONDENCE ADDRESS:
ADDRESSEE: Karl Bozicevic
STREET: 2200 Sand Hill Road
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                MOLECULE TYPE:
ORIGINAL SOURCE:
ORGANISM: SHE
                                                                                                                                                                                                                                                                                                                                                          TITLE OF INVENTION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ATTORNEY/AGENT INFORMATION:
NAME: Valeta Gregg
REGISTRATION NUMBER: 35,
REFERENCE/DOCKET NUMBER:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SEQUENCE CHARACTERISTICS:
LENGTH: 255 amino acids
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   TELEPHONE: (415) 322-5070
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      SOFTWARE: ASCIII CURRENT APPLICATION DATA:
                                                                                                                                                                                                                                      CITY: Menlo Park
STATE: CA
COUNTRY: USA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           STREET:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Local
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FILING DATE:
CLASSIFICATION: 435
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TOPOLOGY:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TYPE: amino acid
STRANDEDNESS: sir
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TELEPHONE:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           88 GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 42;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       T: 2200 Sand Hill Road, Suite 100
Menlo Park
California
                                                                                                                                                                                                                                                                                                                                                                                                          Prusiner, Stanley B. Scott, Michael R.
                                                                                                                                                                                                                                                                                                                                                                                     Telling, Glenn
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  linear
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SHEEP PRION PROTEIN, ShPrP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             peptide
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                single
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             95.5%;
                                                                                                                                                                                                                                                                                                                                                  DETECTING PRIONS IN A SAMPLE AND PRION PREPARATION AND TRANSGENIC ANIMAL USED FOR SAME
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 06510/056001
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Pred. No. 3.9e-17;
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                                                                                                                                   Version #1.
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                                                                                                US-08-713-939A-4
                                            Query Match
Best Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Sequence 4, Applic
Patent No. 5846533
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                                 Matches
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TELEFAX: (415) 854-0875
INFORMATION FOR SEQ ID NO: 4:
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                                                                                                                                                                       NFORMATION FOR SEQ ID NO:
SEQUENCE CHARACTERISTICS:
LENGTH: 255 amino acid
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LENGTH: 255 amino acids
TYPE: amino acid
                                                                                                                                                                                                                                                                                                                                                                 FILING DATE: 13-SEP-1996
CLASSIFICATION: 436
PRIOR APPLICATION DATA:
APPLICATION NUMBER:
                                                                                                                                                                                                                                                                                                                                                                                                                                                  COMPUTER: IBM Compatible
OPERATING SYSTEM: DOS
SOFTWARE: FastSEQ Version 2.0
CURRENT APPLICATION DATA:
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ORIGINAL SOURCE:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                COMPUTER READABLE FORM:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           NUMBER OF SEQUENCES: 8
CORRESPONDENCE ADDRESS:
                                                                                                             MOLECULE TYPE: peptide
                                                                                                                                                                                                                                                        TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-854-5277
                                                                                                                                                                                                                                                                                                                                      ATTORNEY/AGENT INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          REPLICANT: Prusiner, Stanley B.
APPLICANT: Williamson, R. Anthony
APPLICANT: Burton, Dennis R.
FITTE OF INVENTION: ANTIBODIES SPECIFIC FOR NATIVE Pre
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Local Similarity
                                                                                                                                    STRANDEDNESS:
                                                                                                                                                          LENGTH: 255 amino acids TYPE: amino acid
                                                                                                                                                                                                                                                                                        NAME: Bozicevic, Karl
REGISTRATION NUMBER: 28
REFERENCE/DOCKET NUMBER:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 MEDIUM TYPE: Diskette
                                                                                                                          TOPOLOGY:
                                                                                                                                                                                                                                        TELEFAX:
                                                                                                                                                                                                                                                                                                                                                                                                                    APPLICATION NUMBER: FILING DATE: 13-SEE
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               STREET: 2200 Sand Hill Road CITY: Menlo Park
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                               42;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       42;
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 1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
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                                 Conservative
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                                                95.5%;
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Pred. No. 3.9e-17;
0; Mismatches 0
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                                              Score 216; DB 2;
Pred. No. 3.9e-17;
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US-09-031-168-10
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                                                                               Sequence 10, Application US/09031168 Patent No. 6150583
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                                                                                                                                                                                                                                                     Query Match
                                                    GENERAL INFORMATION:
APPLICANT: Stanle
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SEQUENCE CHARACTERISTICS:
             APPLICANT:
                                                                                                                                                                                                                                                                                              MOLECULE TYPE:
ORIGINAL SOURCE:
ORGANISM: SHE
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CLASSIFICATION: 536
PRIOR APPLICATION DATA:
APPLICATION NUMBER:
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SOFTWARE: FastSEQ for Windows Version
CURRENT APPLICATION DATA:
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TELECOMMUNICATION INFORMATION:
TELEPHONE: 650-327-3400
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           FILING DATE:
ATTORNEY/AGENT INFORMATION:
NAME: Bozicevic, Karl
REGISTRATION NUMBER: 28,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 COMPUTER READABLE FORM: MEDIUM TYPE: Diskett
                                        APPLICANT:
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ADDRESSEE: Bozicevic
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FITLE OF INVENTION:
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        APPLICANT:
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                                                                                                                                                                                                                                                                                                                                                               amino acids
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CA
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285 Hamilton Avenue,
                                                                                                                                                                                                                                                                                                                                                                                                                                         650 327-323:
             Fred E.
Michael
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                                        Glenn
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                                                      Stanley B. Prusiner
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                                                                                                                                                                                                                                                                                                SHEEP PRION PROTEIN, ShPrP
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                                                                                                                                                                                                                                                                                                                       peptide
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                                                                                                                                                                                                                                       95.5%;
             Cohen
R. Scott
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TRANSGENIC ANIMALS EXPRESSING
                                       Telling
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                                                                                                                                                                                                                                       Score 216; DB 2;
Pred. No. 3.9e-17;
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                                                                                                                                                                                                                                                    Length 255;
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Matches
                                                                                                                                                                                                                                                 GENERAL INFORMATION:
APPLICANT: Prusiner, Stanley B.
APPLICANT: Williamson, R. Anthony
APPLICANT: Burton, Dennis R.
TITLE OF INVENTION: ANTIBODIES SPECIFIC FOR NATIVE PrP
NUMBER OF SEQUENCES: 86
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           SEQUENCE CHARACTERISTICS:
LENGTH: 255 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            INFORMATION FOR SEQ ID NO:
               COMPUTER: IBM Compatible
OPERATING SYSTEM: DOS
SOFTWARE: FastSEQ Version 2.0
CURRENT APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            MOLECULE TYPE:
ORIGINAL SOURCE:
ORGANISM: SHE
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy of COMPUTER: IBM PC com
                                                                                         COMPUTER READABLE FORM: MEDIUM TYPE: Diskett
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           REGISTRATION NUMBER: 35,127
REFERENCE/DOCKET NUMBER: 07/
TELECOMMUNICATION INFORMATION:
TELEPHONE: (415) 322-5070
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     CURRENT APPLICATION DATA:
                                                                                                                                                                                                  CORRESPONDENCE ADDRESS:
ADDRESSEE: Fish & Richardson P.C.
STREET: 2200 Sand Hill Road
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PRIOR APPLICATION DATA:
APPLICATION NUMBER:
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COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
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STREET: 2200 Sand Hill Road, Suite 100
CITY: Menlo Park
                                                                                                                                                                         STREET: 2200 Sand
CITY: Menlo Park
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              FILING DATE:
CLASSIFICATION:
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                                                                                                                                            COUNTRY:
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APPLICATION NUMBER: US/09/036,579
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(415) 854-0875
TD NO: 10:
                                                                                                                                            U.S.A.
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                                                                                         Diskette
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Pred. No. 3.9e-17;
0; Mismatches 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      DB 3; Length 255;
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RESULT 9
US-09-550-374-4
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Patent No. 6372214
GENERAL INFORMATION:
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                                                                                INFORMATION FOR SEQ ID NO:
                                                                                                                                                                                                                                                    APPLICATION NUMBER: US
FILING DATE:
CLASSIFICATION:
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      NAME: BOZICEVIC, KAT1
REGISTRATION NUMBER: 28,807
REFERENCE/DOCKET NUMBER: 06:
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-854-5277
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        CLASSIFICATION: PRIOR APPLICATION NUMBER:
                                                                                                                                 NAME: Bozicevic, Karl
REGISTION NUMBER: 28,807
REFERENCE/DOCKET NUMBER: 06:
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-854-5277
                                                                                                                                                                                                                                                                                                                                      SOFTWARE: FASTSEQ Version 2.0 CURRENT APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   APPLICANT: Prusiner, Staniey B.
APPLICANT: Williamson, R. Anthony
APPLICANT: Burton, Dennis R.
TITLE OF INVENTION: ANTIBODIES SPI
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ATTORNEY/AGENT INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                         COMPUTER READABLE FORM: MEDIUM TYPE: Diskett
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             CORRESPONDENCE ADDRESS:
ADDRESSEE: Fish & Richardson P.C.
STREET: 2200 Sand Hill Road
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    MOLECULE TYPE:
                                                                SEQUENCE CHARACTERISTICS:
                                                                                                                                                                                                                    ATTORNEY/AGENT INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              NUMBER OF SEQUENCES:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      STREET: 2200 Sand
CITY: Menlo Park
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          TELEFAX: 415-854-0875
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              FILING DATE: 13-SEP-1996
               LENGTH: 255 amino
TYPE: amino acid
STRANDEDNESS: sir
                                                                                                                  TELEFAX: 415-854-0875
                                                                                                                                                                                                                                       FILING DATE:
                                                                                                                                                                                                                                                                                                                                                                         COMPUTER: IBM COR
OPERATING SYSTEM:
                                                                                                                                                                                                                                                                                                                                                                                                                                                            COUNTRY:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TOPOLOGY:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    STRANDEDNESS:
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                                                                                                                                                                                                                                                                                                                                                                                                                                              94025
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                                               255 amino acids
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SYSTEM: DOS
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linear
                                                                                                                                                                                                                                                                                                                                                                                                         Diskette
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               single
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                                                                                                                                                                      06510/059001
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Pred. No. 3.9e-17;
0; Mismatches 0
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RESULT 11
US-09-669-516C-10
; Sequence 10, Application US/09669516C
; Patent No. 6602672
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US-09-943-906-4
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     GENERAL INFORMATION:
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Best Local Similarity
Matches 42; Conserv
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INFORMATION FOR SEQ ID NO: 4:
SEQUENCE CHARACTERISTICS:
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                                                                                                                                                                                                                                                                                    STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide
SEQUENCE DESCRIPTION: SEQ ID NO: 4:
                                                                                                                                                                                                                                                                                                                                                                                                                                              NAME: Bozicevic, Karl
REGISTRATION NUMBER: 28,807
REFERENCE/DOCKET NUMBER: 06510/059001
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-854-5277
TELEFAX: 415-854-0875
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          PRIOR APPLICATION DATA:
APPLICATION NUMBER: 09/550,374
FILING DATE: «Unknown»
ATTORNEY/AGENT INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      CURRENT APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       COMPUTER READABLE FORM:
MEDIUM TYPE: Diskette
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NUMBER OF SEQUENCES: 86
CORRESPONDENCE ADDRESS:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          APPLICANT: Prusiner, Stanley B.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        TITLE OF INVENTION: ANTIBODIES SPECIFIC FOR NATIVE PrP
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                                                                                                                                                GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               APPLICATION NUMBER: US/09/943,906 FILING DATE: 30-Aug-2001 CLASSIFICATION: <Unknown>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       COMPUTER: IBM Compatible OPERATING SYSTEM: DOS SOFTWARE: FastSEQ Version 2.0
                                                                                                                                                                                                                                                                                                                                                             TYPE: amino acid
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               COUNTRY: U.S.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    STATE: CA
                                                                                                                                                                                                                                                                                                                                                                           LENGTH: 255 amino acids
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 CITY: Menlo Park
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Conservative
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llarity 95.5%;
Conservative
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Burton, Dennis R.
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Pred. No. 3.9e-17;
0; Mismatches 0;
                                                                                                                                                                                                 0;
                                                                                                                                                                                             Score 216; DB 4;
Pred. No. 3.9e-17;
0; Mismatches 0;
                                                                                                                                                                                                                                Length 255;
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                                                                      RESULT 13
US-09-823-494-22
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Sequence 22, Application US/09823494
Patent No. 6355610
GENERAL INFORMATION:
APPLICANT: Chesebro, Bruce W
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APPLICANT: Telling, Glenn C.

APPLICANT: Cohen, Fred E.

APPLICANT: Cohen, Fred E.

APPLICANT: SCOCT, Michael R.

TITLE OF INVENTION: RECOMBINANT CONSTRUCT ENCODING EPITOPE
TITLE OF, INVENTION: TAGGED PrP PROTEIN
FILE REFERENCE: UCAL-045CON
CURRENT APPLICATION NUMBER: US/09/669,516C
CURRENT FILING DATE: 2000-09-25
PRIOR APPLICATION NUMBER: 09/031,168
PRIOR FILING DATE: 1998-02-26
PRIOR APPLICATION NUMBER: 08/660,626
PRIOR APPLICATION NUMBER: 08/560,626
PRIOR APPLICATION NUMBER: 08/521,992
PRIOR APPLICATION NUMBER: 08/521,188
PRIOR APPLICATION NUMBER: 08/542,188
PRIOR APPLICATION NUMBER: 08/542,188
PRIOR APPLICATION NUMBER: 08/542,188
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                                                                                                                                                                                                                                                             APPLICANT: Chasebor, Bruce W
APPLICANT: Caughey, Byron W
APPLICANT: Caughey, Byron W
APPLICANT: Caughey, Byron W
APPLICANT: Priola, Susette
TITLE OF INVENTION: Inhibitors of Formation of Protease Resistant Prion
TITLE OF INVENTION: Protein
FILE REFERENCE: 50121
CURRENT APPLICATION NUMBER: US/09/128,450
CURRENT APPLICATION NUMBER: US/09/128,450
CURRENT FILING DATE: 1998-08-03
NUMBER OF SEQ ID NOS: 29
SOFTWARE: Patentin Ver. 2.0
SEQ ID NO 22
LENGTH: 256
TWORD: DATE

LENGTH: 256
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SOFTWARE: FRAKSEQ for Windows Version
SEQ ID NO 10
LENGTH: 255
TYPE: PRT
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               GENERAL INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Query Match
Best Local 9
                                                                                                  Matches
                                                                                                                       Query Match
Best Local S
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                                                                                                                                                                                                                          LENGTH: 256
TYPE: PRT
ORGANISM: Ovis aries
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ORGANISM: bovine
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89
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     ch 88.5%; l Similarity 95.5%; 42; Conservative
                     1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
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                                                                                                                          Similarity
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                                                                                               Conservative
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                                                                                                  Mismatches
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APPLICANT: Caughey, Byron W
APPLICANT: Priola, Susette
ITITLE OP INVERVION: Inhibitors of Formation of Protease Resistant Prion
FILE REFERENCE: 50121
CURRENT APPLICATION NUMBER: US/09/823,494
CURRENT FILING DATE: 2001-03-30
PRIOR APPLICATION NUMBER: 09/28,450
PRIOR APPLICATION NUMBER: 09/28,450
PRIOR PILING DATE: 1998-08-03
NUMBER OF SEQ ID NOS: 29
SOFTWARE: Patentin Ver. 2.0
SEQ ID NO 22
LENGTH: 256
TYPE: PRT
ORGANITOR
                                                                                                                                                                                                                                                                                                                                                                                                                                                            ; SOFTWARE: PatentIn Ver. 2.0
; SEQ ID NO 25
; LENGTH: 256
; TYPE: PRT
; ORGANISM: Ovis sp.
US-09-431-887-25
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US-09-431-887-28
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US-09-431-887-25
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CURRENT APPLICATION NUMBER: US/09/431,887
CURRENT FILING DATE: 1999-11-02
PRIOR APPLICATION NUMBER: GB 9824091.4
PRIOR FILING DATE: 1999-11-04
NUMBER OF SEQ ID NOS: 37
SOFTWARE: PATENTIN Ver. 2.0
SEQ ID NO 28
                                                                                                                  Sequence 28, Application US/09431887
Patent No. 6534036
GENERAL INFORMATION:
APPLICANT: D-Gen Limited
TITLE OF INVENTION: BIOLOGICAL MATERIALS AND METHODS USEFUL IN THE
FILE REFERENCE: ICOT/P21952
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            GENERAL INFORMATION:
APPLICANT: D-Gen Limited
APPLICANT: D-Gen Limited
TITLE OF INVENTION: BIOLOGICAL MATERIALS AND METHODS USEFUL IN THE
TITLE OF INVENTION: DIAGNOSIS AND TREATMENT OF PRION DISEASE
FILE REFERENCE: ICOT/P21952
CURRENT APPLICATION NUMBER: US/09/431,887
CURRENT FILING DATE: 1999-11-02
                                                                                                                                                                                                                                                                                                                                                                                             Query Match
Best Local Similarity
Matches 41; Conserv
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Matches
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Patent No. 653403
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Local Similarity 95.5%;
les 42; Conservative
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95.3%;
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                                                                                                                                                                                                     ; LENGTH: 256
; TYPE: PRT
; ORGANISM: Capra hircus
US-09-431-887-28
Search completed: March 4, 2005, 11:11:09
Job time: 43 secs
                                                                                                                                    Matches 41; Conservative
                                                                                                                                                      Query Match
Best Local
                                                                                                                                                 Match 86.1%;
Local Similarity 95.3%;
                                                                  90 GGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 131
                                                                                    2 GGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                  Score 210; DB 4;
Pred. No. 1.9e-16;
0; Mismatches 0
                                                                                                                                    0; Indels
                                                                                                                                                                 Length 256;
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                                                                                                                                  Gaps
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Post-processing: Minimum Match 0%
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Listing first 45 summaries
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                                                                                                                                    Database
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                                                                                                                                                                                                                                                                                                                                                                                                  Sequence:
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Perfect score:
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                                                                                  BLOSUM62
Gapop 10.0 , Gapext 0.5
                                                                                                                                                                                                                                                                                                                                                                                                                                                                 March 4, 2005, 11:05:20 ; Search time 70 Seconds (without alignments) 237.581 Million cell updates/sec
                                                                                                                                                                                                                                                                                                                   2105692 seqs, 386760381 residues
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    GenCore version 5.1.6
Copyright (c) 1993 - 2005 Compugen
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Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Regult No.

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She	7901 Sheep 2796 Sheep	u07875 Ovine	5605 Sheep	Sheep	8571 Sheep	72362 Sheep pr 72365 Goat pri	3674 Sheep	10165 Sheep	15536 Ovine Pr	33229 Ovin	58870 Sheep pr	1789 Ovine pr	g65855 Ovine	w85903 Sheep	69662 Sheep r	67	31260 N	Aaw70280 Peptide s	ription	

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85.7	85.7	85.7	85.7	86.5	86.5	86.5	87.3	87.3	87.3	87.3	87.3	87.3	87.3	87.3	87.3	88.5	88.5	88.5	88.5
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AAW70261	AAB07328	AAB07317	ADL15231	ABR42797	ABB04422	ABB04423	ADH44565	ADD24190	ADD24189	ABP57904	ABP57903	ABP57902	AAE08572	AAB72363	ADH44566	ADK15537	ADH44564	ADH44554	ADE06742
Aaw70261	Aab07328	Aab07317	Adl15231	Abr42797	Abb04422	Abb04423	Adh44565	Add24190	Add24189	Abp57904	Abp57903	Abp57902	Aae08572	Aab72363	Adh44566	Adk15537	Adh44564	Adh44554	Ade06742
Bovine pr	Cattle pr	Cattle pr	Bovine pr	Goat pric	Sheep pri	Goat prio	Red deer	Mule deer	Elk prion	Elk BSE-r	Mule deer	White tai	Oryx demm	Antelope	Prion pro	Ovine PrP	Feline pr		Sheep pri

ALIGNMENTS

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RRSULT 1
AAW702
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AC AAW7

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24-MAR-1997;
01-MAY-1997;
The invention claims to provide a spongiform encephalopathies (TSE)
                                                                                                                                                               Detecting pathogenic prion(8) in animal carcasses - by reaction with specific labelled antibody, used to detect those carrying agents for bovine spongiform encephalopathy and scrapie.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Key
Region
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                                                                                                Claim 3; Page 23; 25pp; English.
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971E-00000228.
971E-00000325.
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   method for detecting transmissable in animals and in animal carcasses.
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This invention relates to a novel method for detecting Transmissible Spongiform Encephalopathies (TSE) comprising fixing tissue, blood or blood derivative sample, adding a prion-specific antibody and an agent that degrades normal or abnormal prion proteins, and detecting the binding of the antibody to the sample. The method of the invention is useful in detecting Transmissible Spongiform Encephalopathies, e.g. Bovine Spongiform Encephalopathy, Scrapie, Creutzfeldt-Jacob Disease, or Kuru, in humans or animals. This method can also be useful in testing animals, pharmaceuticals and humans for the infective agent responsible for TSE. The method provides a multi-tissue test system which can be use on both blood or blood-derived products and solid tissues from living
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Region
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Prion; PrP; Transmissible Spongiform Encephalopathy; TSE; Bovine Spongiform Encephalopathy; Scrapie; Creutzfeldt-Jacob Disease;
                                                                                                                                                                                                                                                                             Detecting Transmissible Spongiform Encephalopathies, e.g. Creutzfeldt-
Jacob Disease or Kuru, in humans and animals comprises the addition of prion-specific antibody and an agent that degrades normal or abnormal
                                                                                                                                                                                                                                                                                                                                                                                              O'connor
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              WO200257789-A2
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Kuru;
                                                                                                                                                                                                                        Example; Page 15;
                                                                                                                                                                                                                                                                prion
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88. .116
/note= "Antigenic e
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Pred. No. 3.3e-19;
; Mismatches 0;
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GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43

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RESULT 3
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Matches 42; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   animals or human beings, as compared to previous methods of detecting TSE that are carried out only in post-mortem examinations. This allows infected animals to be removed from the population to prevent the spread of the infection, and also allows infected humans to be identified, with the possibility that medical treatment could be administered and a possible cure could be found for the disease. This method is rapid, with the result being available in a matter of hours, cheap, reliable, and user-friendly. The present sequence represents the N terminal sequence of the prion protein (PTP) used to generate the anti-PTP antibody used in the prion protein (PTP) used to generate the anti-PTP antibody used in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Chimeric gene; chimeric prion; transgenic animal; diagnosis; spongiform encephalopathy; PrP; central nervous system; CNS; Creutzfeld-Jakob disease; CJD; BSE.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     AAR86717;
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                                                                                                         Pathogenic prions in a sample can be detected by injecting the sample to be tested into a transgenic mouse. The mouse genome includes a chimeric PrP gene in which the gene includes a portion of a gene of the animal (e.g. sheep) in danger of infection from prions in the sample. Preferred transgenic mice express a chimeric prion protein (PrP) in which a segmen of the mouse PrP, MoPrP, is replaced with the corresponding sheep PrP
                                                                                                                                                                                                                                                                  Chimeric prion protein gene - i susceptible to prion infection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                23-NOV-1995.
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                                                            Sequence 255 AA;
                                                                                                                                                                                                                     Disclosure; Page 43-44; 65pp;
                                                                                                                                                                                                                                                      different species.
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method of the invention
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 Score 216; DB 2; 1
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0; Mismatches 0;
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No. 4.8e-18;
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                                                                                                                                                                                                                               A transgenic mouse has been developed which comprises a genome in which CD both alleles of an endogenous PrP (prion protein) gene of the mouse are ablated, the genome containing operatively inserted all exogenous non-commune PrP gene. The mouse is susceptible to infection with prions which generally only infect a genetically diverse mammal due to the presence of the exogenous PrP gene and ablated endogenous PrP gene. It exhibits CD symptoms of prion disease within 200 days or less after inoculation with prions which generally only infect a genetically diverse mammal. Also CD described in the present invention are: (A) a method of producing the transgenic mouse; and (B) determining the presence of infectious prions CD detect for Creutzfeldt Jakob disease (JD) a fatal neurodegenerative disease of humans caused by prions. The present sequence represents sheep prion protein (ShPrP), from the present invention. (Updated on 25-MAR-CC 2003 to correct PF field.)
                                                                                                                                                  Query Match
Best Local S
Matches 42
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    13-MAY-1994;
31-JUL-1995;
31-AUG-1995;
                                                                                                                                                                                                          Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Transgenic mouse with altered PrP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sheep; prion protein; PrP; Creutzfeldt Jakob disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            25-MAR-2003
19-OCT-1998
                        AAW85903 standard; peptide; 255 AA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                               Example 8;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 1998-456207/39.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            30-JUL-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        11-AUG-1998
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  US5792901-A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Ovis sp.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Sheep prion protein BoPrP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               AAW69662 standard; protein; 255
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (REGC ) UNIV CALIFORNIA.
                                                                                              88
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                                                                                                                                                 l Similarity
42; Conserv
                                                                                                               GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                           255 AA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Telling
                                                                                                                                                                                                                                                                                                                                                                                                                                                               Fig 5; 37pp;
                                                                                                                                                    Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            (revised)
(first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    94US-00242188.
95US-00509261.
95US-00521992.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               ი
ი
                                                                                                                                                              88.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                            English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Prusiner SB
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      transgenic animal; artificial gene; CJD; neurodegenerative disease; human.
                                                                                                                                              0;
                                                                                                                                                              Score 216; DB 2;
Pred. No. 6.1e-16;
                                                                                                                                                    Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     gene - for detecting disease-causing
                                                                                                                                                                           Length 255;
                                                                                                                                                  Indels
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                                                                                                                                                 Gaps
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AAW85903;

US6290954-B1

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RESULT 6
AAG65855
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Best Local
                                                                                                                                                                                                                                                                                                                                                                                                                             This represents a sheep prion protein (PrP) sequence. The invention relates to an antibody that is capable of binding to native PrP(Sc), the scrapic isoform of PrP. The antibody is produced by a method that comprises synthesising a library of antibodies on phages, contacting the phages with a composition containing PrP proteins, isolating phages that bind to native PrP(Sc) in situ, obtaining an antibody from the phages, and optionally analysing the phages to determined a nucleic acid sequence encoding an amino acid sequence to which the native PrP(Sc) binds. The antibody is used to detect disease-associated PrP, especially in Creutzfeldt-Jakob disease (CJD) and distinguish it from normal PrP. They can also be used to neutralise the infectivity of PrP(Sc). Assays using the antibodies can be used to screen for disease-associated PrP in
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        12-FBB-1999 (first Sheep prion protein
                                                                                                            Ovine prion protein
                                                                                                                                          11-FEB-2002
                                                                                                                                                                                                                                                                                                                                                                                       Sequence 255 AA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Disclosure; Col 43-46; 58pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Ovis sp.
                                                                   scrapie;
                                                                               PrP; prion
                                                                                                                                                                                               AAG65855 standard; protein; 255
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Antibody specific for scrapie isoform
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 1999-058996/05
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Prusiner SB,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  cosmetic; therapeutic; sheep.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PrP; PrP(Sc); scrapie; isoform; antibody; prion; CJD; screening;
Creutzfeldt-Jakob disease; infectivity; assay; pharmaceutical; f
                                                                                                                                                                                                                                                                                                                                                                                                                    pharmaceutical products, foods and cosmetics or for therapeutic purposes
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    14-SEP-1995;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                13-SEP-1996;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       (REGC ) UNIV CALIFORNIA
                                                                                                                                                                                                                                                                         88
                                                                                                                                                                                                                                                                                                                                 42;
                                                                                                                                                                                                                                                                                        1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                              Similarity
                                                                   Gerstmann-Strassler-Scheinker disease
                                                                                                                                                                                                                                                                       GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        and therapy
                                                                               protein; Creutzfeldt-Jakob disease; familial insomnia; PrP-Sc;
                                                                                                                                                                                                                                                                                                                                 Conservative
                                                                                                                                         (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (first entry
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                                                                                                           (PrP) sequence.
                                                                                                                                         entry
                                                                                                                                                                                                                                                                                                                                             95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (PrP) sequence
                                                                                                                                                                                                                                                                                                                               <u>.</u>
                                                                                                                                                                                                                                                                                                                              Score 216; DB 2;
Pred. No. 6.1e-16;
0; Mismatches 0
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     of prion protein - useful for
                                                                                                                                                                                                                                                                                                                                 <u>.</u>
                                                                                                                                                                                                                                                                                                                                                         Length 255;
                                                                                                                                                                                                                                                                                                                                 Indels
                                                                                                                                                                                                                                                                                                                               2
                                                                                                                                                                                                                                                                                                                              Gaps
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RESULT 7
ABP51789
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  PRINCE PR
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Best Local S
Matches 42
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Detecting a scrapie isoform of the prion protein (PrP-Sc) in a source, particularly useful for detecting e.g. Creutzfeldt-Jakob disease or Gerstmann-Strassler-Scheinker disease, by contacting the source with P
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 14-SEP-1995;
13-SEP-1996;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    06-MAR-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention provides a method for detecting a scrapic isoform of the prion protein (PrP-Sc) in a source. The method involves contacting the source suspected of containing native PrP-Sc with a diagnostic amount o an antibody characterized by its ability to bind to native PrP-Sc in situ. The method is useful for detecting PrP-Sc in a source, which is particularly useful for detecting PrP-Sc in a source, which is particularly useful for detecting Creutzfeldt-Jakob disease, fatal familial insomnia or Gerstmann-Strassler-Scheinker disease. The present
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    WPI; 2001-637939/73
                                                                                                                                                                                                               14-SEP-1995;
13-SEP-1996;
06-MAR-1998;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Prusiner SB,
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ABP51789 standard; protein;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       sequence
                                                                                                                                          (REGC )
                                                                                                                                                                                                                                                                                                                                                            16-APR-2002.
                                                                                                                                                                                                                                                                                                                                                                                                                                                       OVis
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   detection
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Prion protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Ovine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     03-OCT-2002
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    ABP51789;
                                                                                                                                                                                                                                                                                                               13-APR-2000; 2000US-00550374
                                                                                                                                                                                                                                                                                                                                                                                                          US6372214-B1
Immunoassays for detecting scrapie isoforms of prion protein (PrPSc)
                                                                                             Prusiner SB,
                                                 2002-433675/46.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      prion
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                                                                                                                                            UNIV CALIFORNIA.
SCRIPPS RES INST
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  represents the ovine PrP
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96US-00713939
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96US-00713939.
98US-00036579.
                                                                                             Williamson
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              PrP;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            scrapie; PrPSc; prion disease;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           (PrP)
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Pred. No. 6.1e-16;
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#######55555555555555555555555555555
                                                                                                                                   for purifying PrPSc from samples, useful e.g. in diagnosing PrPSc disease and testing pharmaceuticals for contamination.
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Disclosure; Fig 4; 58pp; English

cc suspected of containing PPRSc proteins and treating materials, using CC antibodies specific for PPRSc. Also described: (1) method of determining CC an animal that has died; (b) contacting the tissue with an antibody CC an animal that has died; (b) contacting the tissue with an antibody CC characterised by its ability to bind to native PPRSc in situ (the CC antibody binds to a form of PPRSc specific to the animal that has died); (c) determining if the antibody has bound to PPRSc (the presence of CC PPRSc in the tissue is indicative of PPRSc infection); (2) a method of CC purifying a material suspected of containing a PPRSc protein, comprising CC (a) contacting the material with an antibody (characterized by its CC (a) contacting the material with an antibody (characterized by its CC (a) contacting material not bound to the antibody; (3) a method of CC treating a material, comprising applying (to the material) an antibody that binds native PPRSc in situ. The methods are used for diagnosing and detecting prion disease (scrapie) in dead animal tissue (i.e. immunopurification) and for treating materials. The present CC (i.e. immunopurification) and for treating materials. The present cC exemplification of the present invention (PPP) which is given in the cxemplification of the present invention The present invention describes methods prion protein (PrPSc) infection in dead for animals, detecting cting scrapie isoforms purifying materials of f

Matches Query Match **Local** 88 42; 1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY Similarity GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY Conservative 95.5%; 0; Score 216; DB 5; Pred. No. 6.1e-16; 0; Mismatches 0 0 Length 255; Indels 130 43 2: Gaps

2

Sequence 255

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RESULT 8 ABU58870 THE STANDARD SON SON THE STANDARD STANDARD SON THE STANDA ABU58870 ABU58870 standard; protein; 255 ₿

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Prion protein; native prion protein; PrPSc; phage display library; pharmaceutical; food; cosmetic; prion neutralisation; anti-PrP-antibody; scrapie; bovine spongiform encephalopathy; BSE; mad cow disease; feline spongiform encephalopathy.

OVie

Sheep prion 15-APR-2003

protein (PrP).

(first entry)

US2002150571-A1

17-OCT-2002

30-AUG-2001; 2001US-00943906.

14-SEP-1995; 13-SEP-1996; 06-MAR-1998; 13-APR-2000; 2000US-00550374 96US-00713939. 98US-00036579. 95US-00528104

(PRUS/) (BURT/)) PRUSINER S |) WILLIAMSON |) BURTON D R. 20 12 ×

Prusiner SB, Williamson RA, Burton 몄;

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ARESULT 9
AAB3329
ID 3A29
AC AAB3
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XX Ovin
DE Ovin
KW Vacc
XX Ovin
KW Vacc
XX Ovin
PN WO20
PN WO20
PN E5-A
XX OVIN
PD O7-N
XX OVIN
PD O
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Best Loc
Matches
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                                  Composition for clearing a disease conformation of a protein, especial: PrPSc protein, and treating, e.g., Creutzfeldt-Jakob disease comprises molecules, e.g., antibodies which bind and prevent conversion to disease conformation.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Ovine; pathogenic; prion protein; PrPSc; kuru; Creutzfeldt-Jakob disease; vaccine; neuroprotective; immunostimulant.
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                                                                                                                The invention relates to a method for treating a prion disease in a subject, comprising administering to a subject having or at risk of developing a prion disease a CpG nucleic acid in an amount to treat the prion disease. Also disclosed is a method for inducing an immune response to a prion protein. The method is useful for treating prion disease, e.g. transmissible spongiform encephalopathy (TSE), scrapie, bovine spongiform encephalopathy (arient creutzfeldt-Jakob disease (VCJD) or latrogenic creutzfeldt-Jakob disease (VCJD) or latrog
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             The invention relates to composition for clearing a disease conformation of a protein, especially pathogenic prion protein (PrPSc) from a cell. The composition comprises molecules which bind a number of epitopes on a first conformation of a protein, where the conversion to a second conformation is prevented to allow a cell to clear protein in the second conformation. The composition is useful for preventing or treating, e.g., kuru or Creutzfeldt-Jakob disease. It is also used as a vaccine. The present sequence is ovine PrP protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Disclosure; SEQ ID NO 13; 57pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Treating a prion disease, e.g. transmissible spongiform encephalopathy, scrapie, bovine spongiform encephalopathy by administering a CpG nucleic acid to a subject having or at risk of developing prion disease.
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                                                                                                                            This invention relates to novel antibodies that bind in situ to the scrapie isoform of the prion protein (PrPSc). Specifically, it refers to antibodies produced by phage display methodology that show a high degree of binding affinity and specificity, and can neutralise the infectivity of prions. The present invention describes using labelled antibodies for an in vivo diagnostic assay that can be used to determine the presence of human PrPSc proteins that are associated with a particular disease. Accordingly, they are also useful for treating prion protein diseases including scrapie, bovine spongiform encephalopathy (BSE), feline spongiform encephalopathy, as well as prion diseases of humans including kuru, Creutzfeldt-Jacob disease (COD), Gerstmann-Strassler-Scheinker Compositions exhibit neuroprotective activity. This polypeptide sequence is the sheep prion protein (PrP) of the invention.
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30-AUG-2001;
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                                                                                                                                                                                                                                                                                                                                                                     New antibody that binds to the scrapie isoform of prion protein useful for treating scrapie, bovine spongiform encephalopathies, spongiform encephalopathies, kuru or Creutzfeldt-Jacob Diseases.
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13-SEP-1996;
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GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
                                               Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   ; 95US-00528104.
; 96US-00713939.
; 98US-00036579.
; 2000US-00550374.
; 2001US-00943906.
                                                                                                       Ä
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      (first
                                                                                                                                                                                                                                                                                                                                                                                                                                                                Williamson
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         prion protein
                                                           95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     95.5%;
                                            0;
                                            Score 216; DB 8;
Pred. No. 6.1e-16;
0; Mismatches 0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             255
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Pred. No. 6.1e
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        (PrP) SeqID 4.
                                                                                                                                                                                                                                                                                                                                                                                                                                                             Burton
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  . 6.1e-16;
0;
                                                                    Length 255
                                            Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Indels
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                                         Gaps
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RESULT 12
AAP93674
ID AAP93
XX AAP93
AC AAP93
XX Scrap
XX Hope
XX Hope
XX Hope
XX Hope
XX WPI;
DR N-PSI
XX WPI;
DR N-PSI
XX Detec
XX Sheeg
CC Sheeg
                                                                                                                                                                                                                                                                                                                                       RESULT 13
AAB72362
ID AAB72
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Query Match
                                                                                                              Prion
prion
                                               Ovis aries.
                                                                                         bovine
                                                                                                                                                                              Sheep prion
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Sheep PrP gene product, in negative line sheep (scrapie resistant) a kb HindIII hybridised to probe pEA974, positive line sheep showed eit a 3.4 kb HindIII or both 5.0 and 3.4 kb fragments. The specification gives three reading frames after base 1410. See also AAN92734
                                                                                                                                                                                                                             11-SEP-2003
17-MAY-2001
                                                                                                                                                                                                                                                                                               AAB72362;
                                                                                                                                                                                                                                                                                                                                            AAB72362
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Sequence 256 AA;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Disclosure; Page; 46pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Detecting susceptibility to scrapie in sheep, cattle analysing blood or tissue for polymorphism linked to pref. using DNA hybridisation probe.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   WPI; 1989-370736/50.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  N-PSDB;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Норе J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       17-MAY-1988;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              30-NOV-1989.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Cricetulus sp.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Scrapie; PrP gene; scrapie associated
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sheep PrP gene
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 31-MAY-1990
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             (ANIM-)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 15-MAY-1989;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WO8911545-A.
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                                                                                                              protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                         89
                                                                                         spongiform
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Н
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity 42; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  AAN92735
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          ANIMAL
                                                                                                                                                                                                                                                                                                                                          standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                            GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Hunter N;
                                                                                                                                                                                                                                                                                                                                                                                                                                                  GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
                                                                                                                                                                            protein cellular form (PrPc) amino acid sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Conservative
                                                                                                                                                                                                                           (revised)
(first en
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          (first entry)
                                                                                                                          cellular form; PrPc; stable region; antibody; BSE;
                                                                                                              spongiform
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             HEALTH
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  for
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       88GB-00011608
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 89WO-GB000522
Location/Qualifiers
                                                                                       ongiform encephalopathies; Scrapie; shee encephalopathy; BSE; Creutzfeldt-Jakob
                                                                                                                                                                                                                                                                                                                                       peptide;
                                                                                                                                                                                                                           entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Bovine spongiform encephalopathy; BSE, fibrils; SAF.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                scrapie susceptibility.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    protein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Score 216; DB Pred. No. 6.1e 0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    256
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              DB 1;
.1e-16;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         0
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Length
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         and goats - by susceptibility,
                                                                                                                                                                                                                                                                                                                                                                                                                                                    131
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   256;
                                                                                       disease
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RESULT 14
AAB72365
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Best Local S
Matches 42
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     This invention relates to a peptide fragment of a cellular form of prion protein PrPc located around a disulphide bond found in PrPc. The stable structure is a specific marker of PrPc but not soluble prion protein (PrPsc). The PrPc peptide sequences can be used to generate an antibody or binding agent that binds PrPc. The antibody is used to detect or remove PrPc, and may be used in preventative medicine. The antibody may be used in the preventation, treatment or diagnosis of a prion disease, e.g. spongiform encephalopathies, such as Scrapie in sheep, bovine spongiform encephalopathies (BSE) in cows, and Creutzfeidt-Jakob disease
                                                                                                                                                                                                              Goat prion protein cellular form (PrPc)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (CJD) in humans. The present sequence represents the cellular form of sheep prion protein, the stable region of the protein may be used in the production of anti-PrPc antibodies. (Updated on 11-SEP-2003 to standardise OS field)
                                                                                                                                                                    Prion protein;
prion disease;
                                                                                                                                                                                                                                          17-MAY-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    Claim 3; Fig 5; 69pp; English
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            diseases e.g. scrapie in sheep, bovine spongicows and Creutzfeldt-Jakob disease in humans.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              New prion peptide for treating, preventing and/or diseases e.g. scrapie in sheep, bovine spongiform
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            27-JUL-1999;
30-JUL-1999;
                                                                                                                           Capra hircus.
                                                                                                                                                                                                                                                                                                 AAB72365 standard; peptide; 256 AA.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Collinge J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     25-JUL-2000; 2000WO-GB002873
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   01-FEB-2001
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Region
                                         WO200107479-A2
                                                                                 Region
                                                                                                                                                         bovine
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                (IMCO-) IMPERIAL COLLEGE INNOVATIONS LTD.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         2001-168538/17.
                                                                                                                                                                                                                                                                                                                                                                         89
                                                                                                                                                    protein; cellular form; PrPc; stable region; antibody; BSE;
disease; spongiform encephalopathies; Scrapie; goat;
spongiform encephalopathy; BSE; Creutzfeldt-Jakob disease.
                                                                                                                                                                                                                                                                                                                                                                                                  1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                              42; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                           Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       256 AA;
                                                                                                                                                                                                                                         (first entry)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Clarke
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99GB-00017878.
                                                                                Location/Qualifiers
176. .221
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                                                                                                                                                                                                                                                                                                                                                                                                                                           95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     훘
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         . 221
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         "Stable region, specifically claimed in claim 3"
                                                                    "Stable region,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Waltho JP,
                                                                                                                                                                                                                                                                                                                                                                                                                           Score 216; DB 4;
Pred. No. 6.1e-16;
0; Mismatches 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Jackson
                                                                  specifically claimed
                                                                                                                                                                                                             amino acid sequence
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S
                                                                                                                                                                                                                                                                                                                                                                                                                                0
                                                                                                                                                                                                                                                                                                                                                                                                                                                         Length 256
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              diagnosing prion encephalopathies
                                                                                                                                                                                                                                                                                                                                                                                                                                Indels
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Hosszu LLP;
                                                                    in claim
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01-FEB-2001

Detecting aberrant animal-derived prion gene, by introducing pric of an animal into a mouse to produce a prion gene modified mouse

prion

on gene and

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AABO8571
ID AAB
XX AAB
XX AAB
XX AAB
XX She
XX She
XX Abe
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XX Ovi
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Matches
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Query Match
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            This invention relates to a peptide fragment of a cellular form of prion protein Prpc located around a disulphide bond found in Prpc. The stable structure is a specific marker of Prpc but not soluble prion protein (PrPsc). The PrPc peptide sequences can be used to generate an antibody or binding agent that binds PrPc. The antibody is used to detect or remove PrPc, and may be used in preventative medicine. The antibody may be used in the prevention, treatment or diagnosis of a prion disease, e.g. spongiform encephalopathies, such as Scrapie in sheep, bovine spongiform encephalopathies (BSE) in cows, and Creutzfeldt-Jakob disease (CJD) in humans. The present sequence represents the cellular form of goat prion protein, the stable region of the protein may be used in the production of anti-PrPc antibodies
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           WPI;
                                                                                 N-PSDB; AAD15273.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Ovis sp
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Aberrant prion gene; heart anomaly; cardiac pharmaceutical; Prnp; life-style related disease; sheep.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Sequence 256
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          New prion peptide for treating, preventing and/or diagnosing prion diseases e.g. scrapie in sheep, bovine spongiform encephalopathies
                                                                                                              WPI; 2001-524142/58
                                                                                                                                                                                                                                                                                                                                       26-JAN-2001; 2001EP-00300723
                                                                                                                                                                                                                                                                                                                                                                                           01-AUG-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Sheep prion protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      15-NOV-2001
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          AAE08571;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 AAE08571 standard;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Claim 3; Fig 5; 69pp; English.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                cows and Creutzfeldt-Jakob disease in humans.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Collinge J,
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  25-JUL-2000; 2000WO-GB002873
                                                                                                                                                                                                                                                                                27-JAN-2000; 2000JP-00019195
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                                                                                                                                                                                                                         (RIKE ) RIKEN
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     Local
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Search completed: March 4, 2005, 11:06:40 Job time: 73 secs
                                                                                                                                                                                                                                                                     Query Match 88.5%;
Best Local Similarity 95.5%;
Matches 42; Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                          The invention relates to a method which is used for detecting aberrant animal-derived prion gene. The method involves introducing Oryx demmah prion gene (Or-Prnp) into a mouse to produce a prion gene modified mouse and determining whether the prion gene modified mouse exhibit heart anomalies. The prion gene modified mouse is useful for development and safety testing of cardiac pharmaceuticals for human and animals having underlying diseases or life-style related diseases. It is also useful for detecting a drug, which reduces abnormal waves in an electrocardiogram. The present sequence is sheep prion protein
                                                                                                                                                                                                                                                                                                                                                                                                                 Sequence 256 AA;
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Copyright (c) 1993 - 2005 Compugen Ltd.
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Query M Best Lo Matches Qy	RESULT 1 JU0268 major prion N;Alternate C;Species: E C;Date: 31-N C;Accession: R;Yoshimoto, Submitted to A;Reference A;Accession: A;Molecule t A;Residues: A;Cross-refidues: A	
atch cals 42 1	JU0268 major prion protein 2 precursor - bovin protein; short C;Species: Bos primigenius taurus (catt C;Species: Bos primigenius taurus (catt C;Steession: JU0268 C;Accession: JU0268 R;Yoshimoto, J.; Iinuma, T.; Ishiguro, Ishimated to JIPID, November 1991 A;Reference number: JU0952 A;Accession: JU0268 A;Mclecule type: DNA A;Residues: 1-256 <yos> A;Accession: JU0268 A;Mclecule type: UNIPROT:Q01880 C;Superfamily: major prion protein C;Superfamily: major prion protein 2F;1-24/Domain: signal sequence #status pred F;182-21/Disulfide bonds: #sratus pred F;184-21/Disulfide bonds: #sratus pred F;184-200/Binding site: carbohydrate (A</yos>	180.5 180.5 180.5 180.5 180.5 180.5 180.5 179 177.5 150 150 150 78.5 73.7
88. milarity 95. Conservative GGGWGQGGSHSQWN	protein 2 precursor - names: prion protein, bos primigenius taurus dar-1992 #sequence_rev JU1028 J: Iinuma, T.; Ishi JIPID, November 1991 number: JT0952 JU0268 :ye: DNA 1-256 <yos> ye: CON 1-256 <yos> yences: UNIPROT: Q0188 yences: UNIPROT: phospha nn: signal sequence #s duct: major prion protei glycoprotein; phospha nn: signal sequence #s duct: major prion pro con: 8-residue repeats sulfide bonds: #sratu</yos></yos>	74.0 74.0 74.0 74.0 73.4 61.5 61.5 61.5 30.7 29.9
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Length 256; . Indels 2; Gaps 2; GLGGY 43 GLGGY 131	<pre>#text_change 09-Jul-2004 i, M.; Imamura, M.; Shinagawa, M. ix Mage; polymorphism; tandem repeat 3IG- 3dicted <mat> it) #status predicted</mat></pre>	major prion protei prion protein homo prion protein fact homeotic protein H heterogeneous ribo

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C;Species: Capra aegagrus hircus (domestic goat)
C;Species: Capra aegagrus hircus (domestic goat)
C;Species: 06-Jan-1995 #sequence_revision 06-Jan-1995 #text_change 09-Jul-2004
C;Accession: S37149
R;Martin, T.C.; Hughes, S.L.; Hughes, K.J.; Dawson, M.
submitted to the EMBL Data Library, August 1993
A;Reference number: S37137
A;Reference number: S37137
A;Accession: S37149
A;Status: preliminary
A;Molecule type: DNA
A;Residues: 1-256 <MAR>
A;Cross-references: UNIPROT:P52113; EMBL:X74758; NID:g400442; PIDN:CAA52774.1; PID:g4004
C;Superfamily: major prion protein
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                                                Matches
                                                                                                 Query Match
                                                                     Local Similarity 95.5%;
                                                42;
1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                Conservative
                                           Score 216; DB 2;
Pred. No. 6.4e-17;
0; Mismatches 0
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A;Residues: 1-256 <WES>
A;Cross-references: UNIPROT:046648; GB:X79912; NID:g510442; PIDN:CAA56283.1; PID:g117158
A;Cross-references: UNIPROT:046648; GB:X79912; NID:g510442; PIDN:CAA56283.1; PID:g117158
A;Coclomann, W.; Hunter, N.; Foster, J.D.; Salbaum, J.M.; Beyreuther, K.; Hope, J.
Proc. Natl. Acad. Sci. U.S.A. 87, 2476-2480, 1990
A;Title: Two alleles of a neural protein gene linked to scrapie in sheep.
A;Reference number: A35983; MUID:90207218; PMID:1969635
A;Accession: A35983
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 R;Westaway, D.; Zuliani, V.; Cooper, C.M.; Da Costa, M.; Genes Dev. 8, 959-969, 1994
A;Title: Homozygosity for prion protein alleles encoding A;Reference number: A54281; MUID:95011594; PMID:7926780
A;Accession: A54281
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                major prion protein - sheep (;Species: Ovis orientalis aries, Ovis ammon aries C;Species: Ovis orientalis aries, Ovis ammon aries C;Date: 06-Jan-1995 #sequence revision 06-Jan-1995 C;Accession: A54281; A35983
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                major prion protein 1 precursor - bovine
N;Alternate names: prion protein, long variant; Prp protein
C;Species: Bos primigenius taurus (cattle)
C;Apate: 09-Sep-1994 #sequence_revision 09-Sep-1994 #text_change
C;Accession: A54330; JT0953; JT0952; A48551; S07347; I46931
R;Goldmann, W.; Hunter, N.; Marrin, T.; Dawson, M.; Hope, J.
J. Gen. Virol. 72, 201-204, 1991
A;Ritle: Different forms of the bovine PrP gene have five or six
A;Reference number: A54330; MUID:91116314; PMID:1671225
A;Accession: A54330;
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A; Residues: 1-170
                                                                                                                                                                                                                                                                                                                                                                                                                                         A;Molecule type: DNA
A;Residues: 1-264 <GOL>
A;Residues: 1-264 <GOL>
A;Cross-references: UNIPROT:P10279; GB:X55882; NID:g683;
A;Yoshimoto, J; Iinuma, T; Ishiguro, N; Horiuchi, M;
submitted to JIPID, November 1991
A;Reference number: JT0952
A;Recession: JT0953
A;Molecule type: DNA
A;Residues: 1-264 <YOS>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        밁
A;Molecule type: mRNA
A;Residues: 1-217,'K',219-264 <YO3>
A;Residues: 1-217,'K',219-264 <YO3>
A;Cross-references: GB:AB001468; NID:g1888342; PIDN:BAA19253.1; PID:g1888343
A;Experimental source: brain
A;Bxperimental source: brain
A;Note: sequence extracted from NCBI backbone (NCBIN:121620, NCBIP:121621)
A;Note: sequence extracted from NCBI backbone (NCBIN:121620, NCBIP:121621)
A;Hope, J.; Reekie, L.J.D.; Hunter, N.; Multhaup, G.; Beyreuther. K.: White
                                                                                                                                                                          A;Molecule type: DNA
A;Residues: 1-217,'K',219-264 <YO2>
A;Residues: 1-217,'K',219-264 <YO2>
R;YOShimoto, J; Iinuma, T; Ishiguro, N;
Virus Genes 6, 343-356, 1992
Virus Genes 6, 343-356, 1992
A;Title: Comparative sequence analysis and A;Reference number: A48551; MUID:93118243;
A;Accession: A48551
                                                                                                                                                                                                                                                                                                                                                                                   A;Cross-references: GB:D10613; NID:g217595; PIDN:BAA01468.1; PID:g217596
A;Accession: JT0952
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;Residues: 1-170,'R',172-256 <GOL>
;Cross_references: GB:M31313; NID:G166039; PIDN:AAB97765.1;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 95.5%;
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Pred. No. 6.4e-17;
0; Mismatches 0
                                                                                                                                                                                                                                                                                                       N.; Horiuchi,
                                                                                                                                                                                                                 expression of PMID:1362024
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#text_change 09-Jul-2004
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Imamura, M.; Shinagawa, M.
                                                                                                                                                                                                                                                   bovine
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                        Scott,
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A;Molecule type: protein
A;Residues: 25-36 <HOP>
R;Prusiner, S.B.; Fuzi, M.; Scott, M.; Serban, D.; Serban, H.
R;Prusiner, S.B.; Fuzi, M.; Scott, M.; Serban, D.; Serban, H.
J. Infect. Dis. 167, 602-613, 1993
J. Infect. Dis. 167, 602-613, 1993
A;Title: Immunologic and molecular biologic studies of prion
A;Reference number: I46931; MUID:93179783; PMID:8440932
A;Accession: I46931
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               C:Superfamily: major prion protein
C:Superfamily: major prion protein
C;Keywords: glycoprotein; phosphatidylinositol linkage; polymorphism; tandem
C;Keywords: signal sequence #status predicted <SIG>
F;1-24/Domain: signal sequence #status predicted <MAT>
F;25-264/Product: major prion protein 1 #status predicted <MAT>
F;06-99/Region: 8-residue repeats (W-G-Q-P-H-G-G-G)
F;190-225/Disulfide bonds: #status predicted
F;192,208/Binding site: carbohydrate (Asn) (covalent) #status predicted
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Nature 336, 390-392, 1988
A;Title: Fibrils from brains
A;Reference number: S07347;
A;Accession: S07347
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C;Superfami
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A; Residues: 1-264 < PRU>
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                                                                                                                                                                                                                                                                           R;Martin, T.C.; Hughes, S.L.; Hughes, K.J.; Dawson, submitted to the EMBL Data Library, August 1993 A;Reference number: S37137 A;Accession: S37137
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                                                                                                                                                                                                                                                                                                                                                                                    prion protein - greater kudu
C;Species: Tragelaphus strepsiceros (greater kudu)
C;Date: 06-Jan-1995 #sequence_revision 06-Jan-1995
                                    Ś
                                                                                                                                                        A;Molecule type: DNA
A;Residues: 1-264 <MAR>
A;Cross-references: UNIPROT:P40242; EMBL:X74771; NID:g398937; PIDN:CAA52781.1; PID:g398
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97
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                        1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
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ĠĠĠĠŴĠQĠĠŦĤĠQŴŊŔŖŚŔ-ŖĸŤŊſĸĬĠŶŶĠĠĀĠĀŶŶĠĠĹĠĠŶ
                                                                                                                                                                                                                                                                                                                                                                                                                                 greater kudu
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90.9%;
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                                                                                      1; Mismatches
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Pred. No. 4e-16;
                                                                                                            Score 209;
Pred. No.
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                                                                                                            4e-16;
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RESULT 6
$334

major prion protein - common marmoset
C;Species: Callithrix jacchus (common marmoset)
C;Date: 28-Oct-1996 #sequence_revision 07-Feb-1997 #text_change 09-Jul-2004
C;Accession: $53634; $71047
R;Schaetzl, H.M.; da Costa, M.; Taylor, L.; Cohen, F.E.; Prusiner, S.B.
J. Mol. Biol. 245, 362-374, 1995
A;Reference number: $53614; MUID:95139066; PMID:7837269
A;Accession: $53634
A;Status: nucleic acid sequence not shown
A;Residues: 1-252 <SCH>
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.., nesidues: 1-241 <SCH>
A;Cross-references: UNIPROT:P40248; EMBL:U08312; NID:g475585; PIDN:AAC50100.1;
R;Schaetzl, H.M.; da Costa, M.; Taylor, L.; Cohen, F.E.; Prusiner, S.B.
J. Mol. Biol. 245, 362-374, 1995
A;Title: Prion protein gene variation among primates.
A;Reference number: 853612; MUID:95139066; PMID:7837755
A;Status: nucleic acid server,
A;Molecule tyre
A; Molecule type: DNA
A; Residues: 1-203, 'R', 205-240 <SCW>
A; Cross-references: EMBL: U08312
C; Superfamily: meia-
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A; Reference number: $71041
A; Accession: $71047
A; Molecule type: DNA
A; Residues: 1-209, 'E', 211-252 <SCW>
A; Cross-references: EMBL:U08304; NID:g474366; PIDN:AAC50092.1; PID:g474367
C; Superfamily: major prion protein
C; Keywords: amyloid; brain; glycoprotein; lipoprotein; prion; scrapie
                                                                                                                                                                                                                                                                                                R;Schatzl, H.m. gubmitted to the EMBL Data Library, **Peference number: $71041
                                                                                                                                                                                                                                                                                                                                                                             major prion protein - Callicebus moloch (fragment)
C;Species: Callicebus moloch
C;Date: 27-Oct-1996 #sequence_revision 07-Feb-1997
C;Accession: S71048; S53632
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S71048
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A;Title: Molecular cloning of a mink prion protein gene.
A;Reference number: JQ1900; MUID:93019035; PMID:1383401
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    major prion protein precursor - European mink
C;Species: Mustcla lutreola (European mink)
C;Date: 31-Dec-1993 #sequence_revision 31-Dec-1993 #text_change
C;Accession: JO1900
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      A;Cross-references: GB:S46825; NID:g258137; PIDN:AAB23801.1; PID:g258138
A;Experimental source: liver
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  A;Residues: 1-257 <KRE>
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Best Local S
Matches 40
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Superfamily: major prion protein;1-24/Domain: signal sequence #status predicted <SIG>;25-257/Product: major prion protein #status predicted
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            GGGGWGQGGGSHGQWGKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 132
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        GGGWGQGGGTHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 127
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Score 195.5; DB 2; Length 257; Pred. No. 1.3e-14; 0; Mismatches 2; Indels 3
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Pred. No. 9.5
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                                                                                                                                                                                                                                                                                                                                                                                                 #text_change 09-Jul-2004
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            <MAT>
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A; Molecule type: protein
A; Residues: 58-72'X', 74-76, 'XX', 79, 'XXX', 83-86;111-128,'V', 130-150
R; Diedrich, J.F.; Knopman, D.S.; List, J.F.; Olson, K.; Frey, W.H.
Hum. Mol. Genet. 1, 443-444, 1992
A; Title: Deletion in the prion protein gene in a demented patient.
A; Reference number: I54322; MUID:93250789; PMID:1363802
A; Accession: I54322
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A;molecule type: DNA
A;Residues: 51-91,'PHGGGWGQPHGGGWGQPHGGGWGQPHGGGWGQPHGGGWGQPHGGG'
A:Cross-references: GB:S80539; NID:g244698; PIDN:AAB21334.1; PID:g244699
                                                                                                                                                                                                                         A;Cross-references: GB:MB1930; NID:g190519; PIDN:AAB59443.1; PID:g190R;Brown, P.; Goldfarb, L.G.; McCombie, W.R.; Nieto, A.; Squillacote, Neurology 42, 422-427, 1992
A;Title: Atypical Creutzfeldt-Jakob disease in an American family with A;Reference number: 158135; MUID:92140671; PMID:1736177
A;Accession: I58135
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     A;Title: Amyloid protein of Gerstmann-Straeussler-Scheinker disease A;Reference number: S14078; MUID:91160504; PMID:1672107 A;Accession: S14078
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              A;Cross-references: GB:D00015; NID:g220015; PIDN:BAA00011.1; PID:g220016; GB:M13667; NIIR;Tagliavini, F.; Prelli, F.; Ghiso, J.; Bugiani, O.; Serban, D.; Prusiner, S.B.; Farlor EMBO J. 10, 513-519, 1991
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   R; Puckett, C.; Concannon, P.; Casey, C.; Hood, L.
Am. J. Hum. Genet. 49, 320-329, 1991
A;Title: Genomic structure of the human prion protein gene.
A;Reference number: A40372; MUID:91328137; PMID:1678248
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   C;Species: Homo sapiens (man)
C;Date: 25-Oct-1987 #sequence_revision 12-Apr-1996 #text_change 09-Jul-2004
C;Date: 25-Oct-1987 #sequence_revision 12-Apr-1996 #text_change 09-Jul-2004
C;Accession: A24173; A40372; A05017; S14078; I54322; I68597; I58135; I59184; I79633; I7.
R;Kretzschmar, H.A.; Stowring, L.E.; Westaway, D.; Stubblebine, W.H.; Prusiner, S.B.; D
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         밁
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A; Residues: 1-80,89-253 < PUC>
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N;Alternate names: ]
                                                                                                                                                                                           A;Status:
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A; Residues: 8-240 < RE3 >
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A; Residues: 9-83,92-240 < RES>
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names: 11K amyloid protein;
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Pred. No. 2e-14;
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llacote, D.;
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RESULT 11
S53635
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A;Residues: 1-210, 7s.,212-253 <SCW>
A;Residues: 1-210, 7s.,212-253 <SCW>
A;Cross-references: EMBL:U08299; NID:g474356; PIDN:AAC50088.1; PID:g474357
C;Superfamily: major prion protein
C;Keywords: amyloid; brain; glycoprotein; lipoprotein; prion; scrapie
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       R;GOLGTATD, L.G.; Brown, P.; McCombie, W.R.; Goldgaber, D.; Swergold, G.D.; Wills, P.R. Proc. Natl. Acad. Sci. U.S.A. 88, 10926-10930, 1991
A;Title: Transmissible familial Creutzfeldt-Jakob disease associated with five, seven, A;Reference number: I59184; MUID:92073400; PMID:1683708
A;Accession: I59184
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          F;23/Domain: carboxy1-cermine predicted F;179-214/Disulfide bonds: #status predicted F:179-214/Disulfide bonds: #status predicted F:181.197/Binding site: carbohydrate (Asn) (...
prion protein - siamang
C;Species: Hylobates syndactylus
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C;Accession:
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(;Species: Hylobates lar (common gibbon, white-handed gibbon)
(;Species: 14-Feb-1997 #sequence_revision 14-Feb-1997 #text_change 09-Jul-2004
(;Date: 14-Feb-1997 #sequence_revision 14-Feb-1997 #text_change 09-Jul-2004)
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A;Note: this gene is associated with Creutzfeld-Jakob disease (CJD), Gerstmar C;Superfamily: major prion protein
C;Keywords: amyloid; blocked carboxyl end; brain; glycoprotein; lipoprotein; F;1-22/Domain: signal sequence #status predicted <SIG>F;1-22/Domain: major prion protein #status predicted <MAT>F;24-92/Region: 8-residue repeats (P-H-G-G-G-W-G-Q)
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A; Residues: 1-253 <SCH>
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A;Reference number: S53614;
A;Accession: S53617
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R;Schaetzl, H.M.; da Costa, M.; Taylor, L.; Cohen, F.E.;

J. Mol. Biol. 245, 362-374 1006
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A; Introns: #status absent
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A; Residues: 60-67 <GOL>
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 submitted to the EMBL Data Library,
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Pred. No. 2.1e-14;
2; Mismatches 0
                                                                                                                                                                                                                                    Score 193.5; DB 2;
Pred. No. 2.1e-14;
2; Mismatches 0;
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PMID:7837269
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A; Molecule type:

DNA

<RES>

UNIPROT: P40252;

EMBL:U15166; NID:g563208; PIDN:AAA68633.1;

PID:g563

Residues:

A;Status: preliminary; translated from GB/EMBL/DDBJ

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RESULT 12
S53614
                       R;Cervenakova, L.; Brown, P.; Goldfarb, L.G.; Nagle, J.; Pettrone, K.; Rubenstein, Proc. Natl. Acad. Sci. U.S.A. 91, 12159-12162, 1994
A;Title: Infectious amyloid precursor gene sequences in primates used for experime: A;Reference number: 136907; MUID:95083661; PMID:7991600
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                C;Species: Gorilla gorilla (gorilla)
C;Date: 28-Oct-1996 #sequence_revision 07-Feb-1997 #text_change 09-Jul-2004
C;Accession: S53614; S71049
R;Schaetzl, H.M.; da Costa, M.; Taylor, L.; Cohen, F.E.; Prusiner, S.B.
J. Mol. Biol. 245, 362-374, 1995
                                                                                                                                             C;Species: Gorilla gorilla (gorilla)
C;Date: 31-May-1996 #sequence_revision 31-May-1996 #text_change
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A;Reference number: S71041
A;Accession: S71049
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A;Note: the source was designated as Symphalangus syndactylus
A;Note: the nuclectide sequence was submitted to the EMBL Data Library, April 1994
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A; Residues: 1-253 < SCH>
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J. Mol. Biol. 245, 362-374, 1995
A;Title: Prion protein gene variation among primates.
A;Reference number: S53614; MUID:95139066; PMID:7837269
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A; Accession: I37032
                                                                                                                           C;Accession: I37032
                                                                                                                                                                                                 major prion protein precursor - gorilla
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            C; Keywords:
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Matches 39
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.;Cross-references: EMBL:U08300; NID:g474358; PIDN:AAC50089.1; PID:g47;Superfamily: major prion protein
;Keywords: amyloid; brain; glycoprotein; lipoprotein; prion; scrapie
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Pred. No. 2.1e-14;
2; Mismatches 0
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C; Superfamily: major prion protein

Similarity

2; Length 253;

The standing warming in the

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major prion protein precursor - chimpanzee C;Species: Pan troglodytes (chimpanzee) C;Date: 31-May-1996 #sequence_revision 31-May-1996 #text_change 09-Jul-2004 C;Accession: I61847; S71066; S53615 C;Accession: I61847; S71066; S53615 C;; Nagle, J:; Pettrone, K.; Rubenstein, R.; Proc. Natl. Acad. Sci. U.S.A. 91, 12159-12162, 1994 A;Title: Infectious amyloid precursor gene sequences in primates used for experimental A;Reference number: I36907; MUID:95083661; PMID:7991600 A;Accession: I61847
                                                                                                                        major prion protein - orangutan
C;Specias: Pongo pygmaeus (orangutan)
C;Specias: Pongo pygmaeus (orangutan)
C;Date: 28-Oct-1996 #sequence_revision 07-Feb-1997 #text_change 09-Jul-2004
C;Accession: $53616; $71059
R;Schaetzl, H.M.; da Costa, M.; Taylor, L.; Cohen, F.E.; Prusiner, S.B.
J. Mol. Biol. 245, 362-374, 1995
A;Title: Prion protein gene variation among primates.
A;Reference number: $53614; MUID:95139066; PMID:7837269
A;Accession: $53614; MUID:95139066; PMID:7837269
A;Accession: $53616
A;Status: nucleic acid sequence not shown
A;Molecule type: DNA
A;Residues: 1-253 <SCH>
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R;Schatzl, H.M.
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A;Reference number: S71041
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"Status nucleic acid sequence not shown
"Molecule type: DNA
"Residues: 1-210,'k',212-253 <SCH>
"Crose-references: EMBL:U08296
"Superfamily: major prion protein
"Keywords: amyloid, brain; glycoprotein; lipoprotein;
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NyResidues: 1-253 <SCW>
NYResidues: 1-254, Prusiner, S.B.
NYResidues: 1-255, 362-374, 1995
NYResidues: 1-255, 362-374, 1995
NYResidues: 1-255, 362-374, MUID:95139066; PMID:7837269
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A;Molecule type: DNA
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A;Residues: 1-210,'B', 212-253 <SCW>
A;Residues: 1-210,'B', 212-253 <SCW>
A;Residues: 1-210,'B', 212-253 <SCW>
C;Superfamily: major prion protein
C;Keywords: amyloid; brain; glycoprotein; lipoprotein; prion; scrapie
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86 GGGWGQGGGTHSQWNKPSK-PKTNMKHMAGAAAAGAVVGGLGGY 128
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1: uniprot_sprot:*
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Copyright (c) 1993 - 2005 Compugen Ltd.
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Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

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NCBL TaxID=9940;
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PRINTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
PROCETTE: PS00291; PRION_1;
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-I SIMILARITY: Belongs to the prion family. BRMBL; AV488861; AAR37332.1; -. HSSP; P04925; 1AG2.
InterPro; IPR000817; Prion. Pfam; PF03991; Prion, 1.
Pfam; PF03991; Prion; 1.
Pfam; PF03991; Prion; Cctapep; 5.
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I- SIMILARITY: Belongs to the prion family.

EMBL; AV488652; AAR37333.1; -.

HSSP; P04925; 1AC2.

InterPro; IPR000817; Prion.

Pfam; PF00377; Prion octapep; 5.

PRINTS; PR00341; PRION.

SMART; SM00157; PRP; I.
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GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                42;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
                                                                                                                        1
197
197
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Eutheria;
Ovis.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        1
197
197 AA;
                                                Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              (TrEMBLrel.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 (Fragment).
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    (Sheep)
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                                                                                                                              ÅΑ;
                                                                                                                          1
197
; 21093 MW;
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PRION_1;
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197
; 21141 MW;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Chordata; Craniata; Vertebrata; Euteleostomi; Cetartiodactyla; Ruminantia; Pecora; Bovidae;
                                                                 95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               Chordata; Craniata; Vertebrata; Euteleostomi; Cetartiodactyla; Ruminantia; Pecora; Bovidae;
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27,
27,
                                      Score 216; DB 2;
Pred. No. 1e-15;
0; Mismatches
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Pred. No. 1e-15;
                                                                                                                    3D8E54D31F1A200F CRC64;
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                                                                              DB 2;
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                                      2;
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RESULT
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Best Local Similarity 95.5
Matches 42; Conservative
                                                                                                                                                                                                                                                                             Ovis aries (Sheep).
Eukaryota; Metazoa; (
Mammalia; Eutheria; (
Caprinae; Ovis.
                                                 SEQUENCE FROM N.A.

MEDLINE-22685694; PubMed=12800515;

TRacikova L., Hanusovska E., Novak M., Arvayova M., Mikula

"The PrP genotype of sheep of the improved Valachian breed.

"The PrP genotype of sheep of the improved Valachian breed.

"The PrP genotype of sheep of the improved Valachian breed.

"The PrP genotype of sheep of the prior family.

"EDIL AV488859; AAR37330.1; -.

HSSP; P04925; 1AG2.
                                                                                                                                                                                                                                                                                                                                                                                                      Q6RVI5;
Q6RVI5;
05-JUL-2004
05-JUL-2004
05-JUL-2004
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NON_TER
SEQUENCE
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Ovis aries (Sheep).
Eukaryota; Metazoa; Mammalia; Butheria; Caprinae; Ovis.
NCBI_TaxID=9940;
                      InterPro; IPR000817; Prion. Pfam; PF00377; Prion; 1.
                                                                                                                                                                                                                                                    NCBI_TaxID=9940;
                                                                                                                                                                                                                                                                                                                                                              Name=prp;
                                                                                                                                                                                                                                                                                                                                                                                  PrP protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           SEQUENCE FROM N.A.

MEDLINS=22685694; PubMed=12800515;
Tkacikova L., Hanusovaka E., Novak M., Arvayova M., Mikula "The PrP genotype of sheep of the improved Valachian breed. Folia Microbiol. (Praha) 48:269-276(2003).

-- SIMILARITY: Belongs to the prion family.

EMBL; AV48860; AAR37331.1; -.

HSSP; P04925; 1AG2.
HSSP; P04925; 1AG2.
HSSP; P04925; 1AG2.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     05-JUL-2004
05-JUL-2004
05-JUL-2004
PrP protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               PROSITE; PS00291; PRION_1; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Pfam; PF00377; Prion; 1.
Pfam; PF03991; Prion octapep;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         nterPro; IPR000817; Prion.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            ; PR00341; PRION.
SM00157; PRP; 1.
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197
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(TrEMBLrel.
(TrEMBLrel.
(Fragment).
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(TrEMBLrel.
(TrEMBLrel.
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    Prion
                    Prion;
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21084 MW;
                                                                                                                                                                                                                                                                                    Chordata; Craniata; Vertebrata; Euteleostomi; Cetartiodactyla; Ruminantia; Pecora; Bovidae;
_octapep;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    95.5%;
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27,
27,
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27,
27,
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Last
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Pred. No. 1e-15;
0; Mismatches
                                                                                                                                                                                                                                                                                                                                                                                                                                               Created)
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Last
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on update)
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RESULT 7
Q6RYR6
ID Q6RY
AC Q6RY
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DT 05-J
DT 05-J
DT 05-J
OT 05-
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Best Local S
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Best Local S
Matches 42
Ovis aries (Sheep).
Eukaryota; Metazoa; C
Mammalia; Eutheria; C
Caprinae; Ovis.
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SEQUENCE
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NON_TER
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05-JUL-2004 (TrEMBLrel.
05-JUL-2004 (TrEMBLrel.
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Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;

Mammalia; Eutheria; Cetartiodactyla; Ruminantia; Pecora; Bovidae;

Caprinae; Ovis.

CAPRINAE: Ovis.
                                                                                                                      Name=prp;
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Pfam; PF00377; Prion; 1.
Pfam; PF03991; Prion octapep;
PRINTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SEQUENCE FROM N.A.

MEDLINE=22685694, PubMed=12800515;

Tkaccikova L., Hanusovska E., Novak M., Arvayova M., Mikula

"The PrP genotype of sheep of the improved Valachian breed.

Polia Microbiol (Praha) 48:269-276(2003).
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SMART; SM00157; PRP; 1.
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197
197 AA;
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197
197 AA;
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                                                                                                                                                                                                                                                                                                            PRELIMINARY;
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197
                         Chordata; Craniata; Vertebrata; Euteleostomi; Cetartiodactyla; Ruminantia; Pecora; Bovidae;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    21112 MW;
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              88.5%;
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Pred. No. 1e-15;
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Pred. No. 1
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Best Local S
Matches 42
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097908;
01-MAY-1999
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SEQUENCE FROM N.A.
MEDLINE-2268594; PubMed-12800515;
MEDLINE-2268594; PubMed-12800515;
Tkacikova L., Hanusovska B., Novak M., Arvayova M., Mikula I.;
Tkacikova L., Hanusovska B., Novak M., Arvayova M., Mikula I.;
"The Prp genotype of sheep of the improved Valachian breed.";
"The Prp genotype of sheep of the improved Valachian breed.";
"The Prp genotype (Praha) 48:269-276(2003).
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SEQUENCE
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                                                                                                                                                                                                                                                      PROSITE;
                                                                                                                                                                                                                                                                                                                                                                                         J. Mol. Biol. 289:1163-1178(1999)

|-- SIMILARITY: Belongs to the prion family.

EMBL; AF117319; AAD1990.1; --

HSSP; P23907; 1G04.
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Wopfner F., Weidenhofer G., Schneider R., v
Schwarz T.F., Werner T., Schatzl H.M.;
"Analysis of 27 mammalian and 9 avian PrPs
of flexible regions of the prion protein.";
J. Mol. Biol. 289:1163-1178(1999)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  01-MAY-1999 (TrEMBLrel. 10, 01-MAY-1999 (TrEMBLrel. 10, 01-OCT-2003 (TrEMBLrel. 25,
                                                                                                                                                                                                                                                                                                   Pfam; PF00377; Prion; 1. Pfam; PF03991; Prion_octapep; SMART; SM00157; PRP; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TISSUE=PBL;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             SEQUENCE FROM N.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        Capra nubiana (Nubian ibex).
Eukaryota, Metazoa, Chordata
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         Name=PrP;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            Prion protein (Fragment).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             pfam; pP00377; Prion; 1.
pfam; pP03991; Prion octapep;
pRINTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Folia Microbiol. (Praha) 48:269-276 (2003).
-!- SIMILARITY: Belongs to the prion family.
EMBL, AY485346; AAR36137.1; -
HSSP; P04925; 1AG2.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   NCBI_TaxID=72543;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                WEDLINE=99303687; PubMed=10373359; DOI=10.1006/jmbi.1999.2831;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Prion
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                                                                                                                                                                                                                                                                                                                                                                      InterPro; IPR000817; Prion.
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                                                                         42;
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                                                                                              Similarity
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GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
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                                                                                                                                                                                                                                                    PS00291; PRION_1; 1. PS00706; PRION_2; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 PS00291; PRION_1; 1.
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202
202 AA;
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197
197 AA;
                                                                    88.5%;
nilarity 95.5%;
Conservative
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197
                                                                                                                                                                 21949 MW;
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                                                                    Score 216; DB 2; |
Pred. No. 1.1e-15;
0; Mismatches 0;
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Pred. No. 1e-15;
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RESULT OR RESULT OR RECORD OR RECORD
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PRIO_BUDTA
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Best Local S
Matches 42
                                                                                                                                                                  SEQUENCE FROM N.A.

PubMed=11805443; DOI=10.1159/000050072;

Seo S. W. Hara K., Kubosaki A., Nasu Y., Nishimu.

Matsumoto Y., Endo H., Onodera T.;

"Comparative analysis of the prion protein open nucleotide sequences of two wild ruminants, the
                                                                                         Intervirology 44:359-363(2001)
-!- FUNCTION: The function of Prp
host genome and is expressed by
                                                           -
                                                                                                                                                                                                                                                                                                                                           Name=PRNP;
Budorcas taxicolor (Golden takin).
Budorcas taxicolor (Golden takin).
Bukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
Bukaryota; Metazoa; Carartiodactyla; Ruminantia; Pecora; Bovidae;
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Q1-JUN-2003 (TrEMBLrel. 24,
Q1-JUN-2003 (TrEMBLrel. 24,
Q1-MAR-2004 (TrEMBLrel. 26,
Prion protein (Fragment).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       PRIO BU
Q95M08;
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SEQUENCE FROM N.A.

MEDLINE-22408137; PubMed=12519913; DOI=10.1093/molbev/msg014;
van Rheede T., Smolenaars M.M., Madsen O., De Jong W.W.;

"Molecular evolution of the mammalian prion protein.";

Mol. Biol. Evol. 20:111-121(2003).
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NON_TER
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-!- SIMILARITY: Belongs to the prion family.
EMBL; AY133058; AAN16512.1; -.
HSSP; P23907; 1G04.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         InterPro; IPR000817; Prion.
Pfam; PF03991; Prion octapep;
PRINTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Orycteropus afer (Aardvark).
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Mammalia; Eutheria; Tubulidentata; Orycteropodidae; Orycteropus.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Q866V0
    similarity).

SUBUNIT: PrP has a tendency to aggregate yielding "rods" (By similarity).

SUBCELLULAR LOCATION: Attached to the membrane by
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         BUDTA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 132
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     248
248 AA;
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(Rel. 45, Last annotation updat
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Last
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Pred. No. 1
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annotation update)
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membrane by a GPI-anchor (B)
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RESULT 11
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Best Local S
Matches 42
                                                                                                                                                                                                                                                    Eukaryota; Metazoa; (
Mammalia; Eutheria; (
Caprinae; Capra.
NCBI_TaxID=9925;
Goldmann W., Martin T., Foster J.,
Dawson M., Hunter N.;
"Novel polymorphisms in the caprin
                                                                                                                                          STRAIN-Anglo-Nubian; TISSUE-Peripheral blood lymphocytes; Martin T.C., Hughes S.L., Hughes K.J., Dawson M.; Submitted (SEP-1993) to the EMBL/GenBank/DDBJ databases.
                                                                STRAIN=Anglo-Nubian;
MEDLINE=97081203; PubMed=8922485;
                                                                                                                                                                                                                                                                                                                                Major prion protein precursor (PrP)
Name=PRNP; Synonyms=PRP;
Capra hircus (Goat)
                                                                                                                                                                                                                                                                                                                                                                                 PRIO CAPHI STANDARD; PRT; 256 AA. P521I3; O1-OCT-1996 (Rel. 34, Created) O1-OCT-1996 (Rel. 34, Last sequence update) O5-JUL-2004 (Rel. 44, Last annotation update)
                                                                                                                SEQUENCE FROM N.A.,
                                                                                                                                                                                                                   SEQUENCE FROM N.A.
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Pfam; PF00377; Prion; 1.
Pfam; PF00379; Prion octapep;
PRINTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          DOMAIN
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Glycoprotein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      PROSITE; PS00291; PRION 1; 1. PROSITE; PS00706; PRION 2; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    This SWISS-PROT entry is copyright. It is produced through a collable between the Swiss Institute of Bioinformatics and the EMBL outst the European Bioinformatics Institute. There are no restrictions use by non-profit institutions as long as its content is in endified and this statement is not removed. Usage by and for come the requires a license agreement (See http://www.isb-sib.ch/an
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 EMBL; AB060290; BAB69957.1; -. HSSP; P10279; 1DWY.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         or send an email to license@isb-sib.ch).
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SIMILARITY: Belongs to the prion family.
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42; Conserv
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         GGGGWGQGGSHSQWNKÞSK-ÞKTNMKHVAGAAAAAGAVVGGLGGY 131
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
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                                                                                                            AND
                                                                                                                                                                                                                                                                                      Chordata; Craniata; Vertebrata; Eutel Cetartiodactyla; Ruminantia; Pecora;
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                                                                                                            VARIANT MET-142
        caprine
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GPI-anchor amidated alan
N-linked (GlcNAc. . ) (
N-linked (GlcNAc. . ) (
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Pred. No. 1.3e-15;
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        Prp
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      gene:
                                         s:
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mature form (Potential)
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                                           Smith G., Hughes
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                                                                                                                                                                                                                                                                                    Bovidae;
    mutation
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      -I- FUNCTION: The function of PrP is not known. PrP is host genome and is expressed both in normal and in -I- SUBUNIT: PrP has a tendency to aggregate yielding "rods".
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     goats.";
J. Comp.
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PROPEP
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EMBL; X91999; CAA63050.1; -.
EMBL; S82626; AAD14409.1; -.
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STRAIN=African dwarf; TISSUE=Blood;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Goldmann W., Martin T., Foster Dawson M., Hunter N.; J. Gen. Virol. 78:697-697(1997)
                                                            SEQUENCE
                                                                                                                                                                                                                                                                                                                                                                                                                                        Repeat; Signal
SIGNAL
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PIR; S37149; S37149.
HSSP; P23907; 1G04.
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Obermaier G., Kretzschmar H.A., H
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 associated with scrapie incubation period.", J. Gen. Virol. 77:2885-2891(1996).
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                                                                                                                                                                                                                                                                                                    DOMAIN
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PROSITE; PS00706; PRION_2; 1.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        PRINTS; PR00341; PRION
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Obermaier G., Kretzschmar H.A., Hai
"Spongiform central nervous system
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       DISEASE: Found in high quantity in the brain of humans and aniinfected with degenerative neurological diseases such as kuru, Creutzfeldt-Jakob disease (CJD), Gerstmann-Straussler syndrome (GSS), scrapie, bovine spongiform encephalopathy (BSE), SIMILARITY: Belongs to the price of the price o
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            SWISS-PROT entry is copyright. It is produced through a collaboration een the Swiss Institute of Bioinformatics and the EMBL outstation -
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                PF03991, Prion
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                                                            ME.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Lipoprotein; Membrane; Polymorphism; Prion;
                                                                                                                                                                                                                                                                                                                                 By similarity.

Major prion protein.

Major prion protein.

Removed in mature form (
GPI-anchor amidated alan

N-linked (GlcNAc. . .) (
N-linked (GlcNAc. . .) (
                                                       I -> M (appears to be associated with differing disease incubation periods goats experimentally infected with isolates of bovine spongiform encephalopathy or sheep scrapie).

BDA5795F6FD99746 CRC64;
Score 216;
Pred. No. 1
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                                                                                                                                                                                                                                                                                           By similarity.

5 X 8 AA +=-
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tem myelinopathy in
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  DB 1;
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cican dwarf
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018754; 019016;
15-JUL-1998 (Rel. 36, Created)
15-JUL-1998 (Rel. 36, Last sequence up
05-JUL-2004 (Rel. 44, Last annotation
Major prion protein precursor (PrP)
Name=PRNP; Synonyms=PRP;
                                                                                       CHAIN
PROPEP
                                                                                                                                                                                                                                                                                                                           EMBL; AF003087; AAB70468.1; -.
EMBL; Y13698; CAA74032.1; -.
HSSP; P23907; 1G04.
                                                                                                                                                                                                                                                                                                                                                                                                                                   This SWISS-PROT entry is copyright. It is produced through between the Swiss Institute of Bioinformatics and the ENthe ENTOPEAN BIOINFORMATICS Institute. There are no restruse by non-profit institutions as long as its content modified and this statement is not removed. Usage by ancentities requires a license agreement (See http://www.isb-sentities.com/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/license/lice
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    TISSUE=Blood, and Bra
Rohwer R.G., Edelman
Submitted (MAY-1997)
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     FELCA
                                                                                                                                                                                                PROSITE; PS00291; PRION_1; 1. PROSITE; PS00706; PRION_2; 1.
                                                                                                                                                                                                                                           Pfam; PF03991; Prion octapep; PRINTS; PR00341; PRION.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ++
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Taylor M.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   SEQUENCE FROM N.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         NCBI_TaxID=9685;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Eukaryota; Metazoa;
Mammalia; Eutheria;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          SEQUENCE OF 112-235 FROM N.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Pelis silvestris catus (Cat).
                                                                     DIGIT
                                                                                                                                                                                                                                                                                                            InterPro; IPR000817; Prion.
                                                                                                                                                                                                                                                                                                                                                                                                                   send
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  (GSS), scrapie, bovine spongiform encephalopathy (BSE), transmissible mink encephalopathy (TME), etc.
SIMILARITY: Belongs to the prion family.
CAUTION: Ref.1 sequence seems to be incorrect, it is too close in sequence to that of sheep to be taxonomically correct. We have used Ref.2 sequence in the region where it is available (112-235), but the rest of the sequence probably contains incorrect residues. DATABASE: NAME=Cat PRP, NOTE=Web page on cat sequence problems; WMW="http://www.mad-cow.org/~tom/cat_prion.html".
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SUBCELLULAR LOCATION: Attached to the membrane by a GPI-anchor. DISEASE: PrP is found in high quantity in the brain of humans a animals infected with the degenerative neurological diseases ku creutzfeldt-Jakob disease (CJD), Gerstmann-Straussler syndrome
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 SUBUNIT: PrP has a tendency to aggregate yielding polymers
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         FUNCTION: The function of PrP is not known. PrP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     host genome and is expressed both in normal and infected
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY
                                                                                                                                                                                                                                                                                   PF00377; Prion; 1.
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                                                                                                                                                                                                                                                                                                                                                                                                                   email to license@isb-sib.
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Chordata; Craniata; Vertebrata; Euteleostomi; Carnivora; Fissipedia; Felidae; Felis.
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                                                                                                                                                                              Lipoprotein;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 Flanagan
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By similarity.
Major prion potein.
Removed in mature form (Potential).
Removed in mature form (Potential).
RPI-anchor amidated alanine (Potential).
N-linked (GlCNAc. . .) (Potential).
N-linked (GlCNAc. . .) (Potential).
By similarity.
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                                                                                                                                                                            Repeat;
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Best Local S
Matches 42
                                                             Signal.
SIGNAL
CHAIN
                               PROPEP
LIPID
                                                                                                                     EMBL; AF166334; AAD48030.1; -.
PROSITE; PS00291; PRION 1; 1.
PROSITE; PS00706; PRION 2; 1.
                                                                                                                                                                             the European Bioinformatics Institute. The use by non-profit institutions as long modified and this statement is not removed. entities requires a license agreement (See lor send an email to license@isb-sib.ch).
                                                                                                                                                                                                                                                                                                                                                                                             host genome and is expressed both in normal and in standardy).

slandardy).

subung: Pre has a tendency to aggregate yielding "rods" (By similarity).

1- SUBCELLULAR LOCATION: Attached to the membrane by
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         25-OCT-2004
25-OCT-2004
25-OCT-2004
                                                                                                                                                                                                                                                                                  This
                                                                                                                                                                                                                                                                                                similarity).
-!- SIMILARITY: Belongs to the prion family.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Mammalia; Eutheria;
Caprinae; Ovis.
NCBI_TaxID=37174;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       Ovis canadensis (Bighorn sheep).
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TISSUE=Brain;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  SEQUENCE FROM N.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          Eukaryota; Metazoa;
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CONFLICT
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                                                                                                                                                                                                                                                  SWISS-PROT entry is copyright. It is produced through a collaboration een the Swiss Institute of Bioinformatics and the EMBL outstation -
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      OVICA
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
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(Rel. 45,
(Rel. 45,
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                                                                                                    Lipoprotein;
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,¥
By similarity.
Major prion protein.
Removed in mature form (Potential).
GPI-anchor amidated alanine (Potential).
N-linked (GlcNAc. . .) (Probable).
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Pred. No. 1.3e-15;
0; Mismatches 0
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                                                                                                                                                                                        noved. Usage by and for commercial (See http://www.isb-sib.ch/announce/
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                                                                                                   Membrane;
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                                                                                                 Prion;
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RESULT 14
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Best Local S
Matches 42
                                                                        EMBL; AF117320; AAD19991.1; -.
InterPro; IPR000817; Prion.
Pfam; PP00377; Prion; 1.
Pfam; PP03991; Prion octapep; 5.
PRLNTS; PR00341; PRION.
SMART; SM00157; PRP; 1.
PROSITE; PS00291; PRION 1; 1.
PROSITE; PS00706; PRION 2; 1.
     Glycoprotein;
Signal.
SIGNAL
CHAIN 2
PROPEP 23
LIPID 23
                                                                                                                                                                                       This SWISS-PROT entry is copyright. It is produced through a between the Swiss Institute of Bioinformatics and the EWBL the European Bioinformatics Institute. There are no restrictuse by non-profit institutions as long as its content is modified and this statement is not removed. Usage by and frentities requires a license agreement (See http://www.isb-sib-entities.requires a license agreement (See http://www.isb-sib-entities.requires.alicense.agreement (See http://www.isb-sib-entities.requires.alicense.agreement (See http://www.isb-sib-entities.requires.alicense.agreement (See http://www.isb-sib-entities.agreement.agreement)
                                                                                                                                                                                                                                                                                                                                                         Wopfner F., Weidenhofer G., Schneider R., von Br
Schwarz T.F., Werner T., Schatzl H.M.,
"Analysis of 27 mammalian and 9 avian PrPs revea
of flexible regions of the prion protein.",
J. Mol. Biol. 289:1163-1178(1999).
                                                                                                                                                                        or send an email to license@isb-sib.ch).
                                                                                                                                                                                                                                                                                                similarity).

-!- SUBUNIT: PrP has a tendency to aggrega "rods" (By similarity).

-!- SUBCELLULAR LOCATION: Attached to the
                                                                                                                                                                                                                                                                          similarity).
-i- SIMILARITY: Belongs to the prion family.
                                                                                                                                                                                                                                                                                                                                                                                                                               SEQUENCE FROM N.A. MEDLINE=9930369; PubMed=10373359; DOI=10.1006/jmbi.1999.2831;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                      Caprinae; Ovibos.
NCBI_TaxID=37176;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Mammalia; Eutheria;
Caprinae; Ovibos.
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25-OCT-2004
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(Rel. 45, Last sequence update)
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                                                              GPI-anchor;
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27887 MW;
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                                                           Lipoprotein; Membrane;
By similarity.
Major prion protein.
Removed in mature for
GPI-anchor amidated a
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Pred. No. 1.3e-15;
0; Mismatches (
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By similarity.
5 X 8 AA tandem repeats of P-H-G-G-W-G-
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                        PROSITE; PS00291; PRION 1; 1.
PROSITE; PS00706; PRION 2; 11 on Glycoprotein; GPI-anchor; Lipop signal.

1 24 By CHAIN 25 23 Ma PROPEP 234 256 Re LIPID 233 23 GF CARBOHYD 184 N-CARBOHYD 200 200 N-
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Seo S.W., Hara K., Kubosaki A., Nasu Y., Nishimura T., Saeki K.,
Matsumoto Y., Endo H., Onodera T.;
"Comparative analysis of the prion protein open reading frame
"Comparative analysis of two wild ruminants, the moufflon and golden
                                                                                                                                                                                                                      the European Bioinformatics Institute. There are no rest
use by non-profit institutions as long as its content
modified and this statement is not removed. Usage by ar
                                                                                                                                                                                                                                             This SWISS-PROT entry is copyright. It is produced through a collaboration between the Swiss Institute of Bioinformatics and the EMBL outstation between Bioinformatics Institute. There are no restrictions on its
                                                                                                                                                                                                                                                                                                                             -i- SUBUNIT: PrP has a tendency to aggregate yielding polymers called
"rods" (By similarity).
-i- SUBCELLULAR LOCATION: Attached to the membrane by a GPI-anchor (B)
                                                                                                                                                                                                                                                                                                                                                                               Intervirology 44:359-363(2001).
-I- FUNCTION: The function of PrP is not expressed both in
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Mammalia; Eutheria;
Caprinae; Ovis.
                                                                                                                                                       EMBL; AB060288; BAB69955.1; -. EMBL; AB060289; BAB69956.1; -.
                                                                                                                                                                                               or send an email to license@isb-sib.ch).
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                                                                                                                                                                                                                                                                                                    -I- SIMILARITY: Belongs to the prion family.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     SEQUENCE FROM N.A.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               NCBI_TaxID=9938;
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By similarity.

Major prion protein.

Major prion protein.

Removed in mature form (Potential).

GPI-anchor amidated alanine (Potential).

N-linked (GlcNAc. . .) (Probable).

N-linked (GlcNAc. . .) (Probable).
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N-linked (GlcNAc. . .) (Probable).
By similarity.
5 X 8 AA tandem repeats of P-H-G-G-W-G-
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Sequence 3, Appli
Sequence 4, Appli
Sequence 4, Appli
Sequence 4, Appli
Sequence 22, Appl
Sequence 28, Appli
Sequence 5, Appli
Sequence 11, Appli
Sequence 11, Appli
Sequence 81, Appli
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209	209	209	209	209	209	210	210	210	211	211	213	213	213	213	213	216	216	216	216	216	216	216	216	216	216	216	216	216	216	216	216
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264	264	263	263	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256	256
14	9	15	φ	16	13	16	14	14	15	14	15	15	13	13	13	16	16	16	16	16	16	16	16	16	16	16	16	16	16	16	16
US-10-209-194-2	US-09-823-494-21	35-602	3-906-	-10-479-21	09-551-	-10-479-	0-304-630-	-10-304-630-2	0-301-448-	-488A-	46-190-E	-10-346-	-10-109-551-1	-10-109-551-	-10-109-551-	-10-479-218-2	-479-218-	-10-479-218-1	-10-479-218-1	-10-479-218-	-10-479-218-1	-10-479-218-1	-10-479-218-1	-91	18-1	-10-479-218-	-10-479-218-	-10-479-21	0-479-218-	-10-479-218-	US-10-479-218-1
e 2,	21,	e w	'n	w	N	(D	e 2	e 2	e 2	Sequence 29, Appl	8	e 8:	e 1	e 8,		e 20,	e 19,	e 18,	17,	16,	Sequence 15, Appl	e 14,	equence 13,	e 12,	e 11,	e 10,	e 9,	е В,	equence 7,	e 6,	•

444403354333009311144 4444033553330093111753

ALIGNMENTS

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US-09-147-761-3
Sequence 3, Application US/09147761
Patent No. US20010019918A1

PAPLICANT:
APPLICANT:
TITLE OF INVENTION: INMUNOLOGICAL ASSAY FOR SPONGIFORM
TITLE OF INVENTION: ENCEPHALOPATHIES
NUMBER OF SEQUENCES: 4
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC Compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patentin Release #1.0, Version #1.30 (EPO)
CURRENT APPLICATION NUMBER: US/09/147,761
FILING DATE:
APPLICATION NUMBER: WO IE/98/00007
FILING DATE:
APPLICATION DATA:
APPLICATION DATA:
APPLICATION DATA:
APPLICATION DATA:
APPLICATION DATA:
TELEPHONE: 353-1-660503
TELEPAX: 353-1-660503
TELEPAX: 353-1-660503
TELEPAX: 353-1-6605020
INFORMATION FOR SEQ ID NO: 3:
SEQUENCE CHARACTERISTICS:
LENGTH: 43
TYPE: amino acid
TOPOLOGY: unknown
MOLECULE TYPE: Amino acid
HYPOTHETICAL:
ANTI-SENSE:
ORGANISM:
ORGANISM:
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CURRENT APPLICATION NUMBER: US/09/939,780
PRIOR APPLICATION NUMBER: 2001-08-28
PRIOR APPLICATION NUMBER: 09/147,761
PRIOR PILING DATE: 1999-03-03
PRIOR APPLICATION NUMBER: PCT/IE98/00007
PRIOR PILING DATE: 1998-02-06
NUMBER OF SEQ ID NOS: 5
SOPTWARE: PATENTIN Ver. 2.1
SEQ ID NO 3
LENGTH: 43
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US-09-943-906-4
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      ; OTHER INFORMATION: Description of Artificial Sequence:prion protein ; OTHER INFORMATION: specific synthetic peptide US-09-939-780-3
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                           RESULT 2
US-09-939-780-3
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                                                                                                                                                                                                                                                                                                                                                                   Sequence 4, Application US/09943906
Patent No. US20020150571A1
GENERAL INFORMATION:
APPLICANT: Prusiner, Stanley B.
Williamson, R. Anthony
Burton, Dennis R.
TITLE OF INVENTION: ANTIBODIES SPECIFIC FOR NATIVE PrP
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Query Match 100.0%; Score 244; DB 9; Best Local Similarity 100.0%; Pred. No. 1.7e-18; Matches 43; Conservative 0; Mismatches 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             Sequence 3, Application US/09939780
Patent No. US20020168689A1
GENERAL INFORMATION:
APPLICANT: O'Connor, Michael
TITLE OF INVENTION: Immunological Assay for Spongiform Encephalopathies
FILE REFERENCE: 50002US
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Matches
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       ORGANISM: Artificial Sequence
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                TYPE: PRT
      COMPUTER READABLE FORM:
MEDIUM TYPE: Diskette
COMPUTER: IBM Compatible
OPERATING SYSTEM: DOS
SOFTWARE: FASTSEQ Version 2.0
CURRENT APPLICATION UNMBER: US/09/943,906
FILING DATE: 30-Aug-2001
CLASSIFICATION: CURKNOWN>
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Local Similarity
                                                                                                                                                                                                                                                                                     CORRESPONDENCE ADDRESS:
ADDRESSEE: Fish & Richardson P.C.
STREET: 2200 Sand Hill Road
PRIOR APPLICATION DATA:
                                                                                                                                                                                                                                                                                                                                                               NUMBER OF SEQUENCES:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                     tch 100.0%; Score 244; DB 9; al Similarity 100.0%; Pred. No. 1.7e-18; 43; Conservative 0; Mismatches 0;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAGAAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAGAAAGAVVGGLGGY 43
                                                                                                                                                                                                                                                        CITY: Menlo Park
STATE: CA
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              GGGGWGQGGSHSQWNKPSKPPKTNMKHVAGAAAGAVVGGLGGY 43
                                                                                                                                                                                                                               COUNTRY: U.S.A.
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CURRENT APPLICATION NUMBER: US/10/435,602
CURRENT FILING DATE: 2003-05-09
PRIOR APPLICATION NUMBER: 09/943,906
PRIOR PILING DATE: 2001-08-30
PRIOR APPLICATION NUMBER: 09/950,374
PRIOR FILING DATE: 2000-04-13
PRIOR FILING DATE: 1990-04-13
PRIOR APPLICATION NUMBER: 09/036,579
PRIOR FILING DATE: 1998-03-06
PRIOR APPLICATION NUMBER: 08/713,939
PRIOR APPLICATION NUMBER: 08/713,939
PRIOR APPLICATION NUMBER: 08/528,104
PRIOR APPLICATION NUMBER: 08/528,104
PRIOR APPLICATION NUMBER: 08/528,104
PRIOR APPLICATION NUMBER: 08/528,104
PRIOR FILING DATE: 1995-09-14
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                                                                                     Matches
                                                                                                          Query Match
Best Local (
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Publication No. US20030228303A1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                APPLICANT: Prusiner, Stanley B.
APPLICANT: Williamson, R. Anthony
APPLICANT: Burton, Dennis R.
TITLE OF INVENTION: Antibodies Specific for Native PrPSc
                                                                                                                                                                                                                                                                                              NUMBER OF SEQ ID NOS:
                                                                                                                                                                                         ORGANISM: ovine
                                                                                                                                                                                                               LENGTH: 255
TYPE: PRT
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SEQUENCE CHARACTERISTICS:
                                                                                                      Local Similarity
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   Match 88.5%;
Local Similarity 95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              TOPOLOGY: linear MOLECULE TYPE: peptide SEQUENCE DESCRIPTION: SEQ ID NO:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       REGISTRATION NUMBER: 28,807
REFERENCE/DOCKET NUMBER: 06
TELECOMMUNICATION INFORMATION:
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  APPLICATION NUMBER: 09/550,374
FILING DATE: <Unknown>
ATTORNEY/AGENT INFORMATION:
        88
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  42;
                     1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
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GGGGWGQGGSHSQWNKPSK-PKTNMKHVAGAAAAGAVVGGLGGY 130
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TYPE: amino acid
STRANDEDNESS: single
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                 TELEFAX: 415-854-0875
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                                                                                   Conservative
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                                                                                                      95.5%;
                                                                                   0; Mismatches
                                                                                                  Score 216; DB 15;
Pred. No. 7.8e-15;
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Pred. No. 7.8e-15;
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                                                                                 Indels
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RESULT 5
US-09-823-494-22
; Sequence 22, Application US/09823494
; Publication No. US20010041790A1

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PILE REFERENCE: TAMK:207US
CURRENT APPLICATION NUMBER: US/10/109,551
CURRENT FILING DATE: 2002-03-28
PRIOR APPLICATION NUMBER: 60/280,549
PRIOR FILING DATE: 2001-03-30
NUMBER OF SEQ ID NOS: 10
SOPTWARE: Patentin Ver. 2.1
SEQ ID NO 4
LENGTH: 256
                                                                                                                                                                                        US-10-301-488A-28
Sequence 28, Application US/10301488A
Publication No. US20030166558A1
GENERAL INFORMATION:
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US-10-109-551-4
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US-09-823-494-22
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                  Sequence 4, Application US/10109551
Publication No. US20020194635A1
GENERAL INFORMATION:
APPLICANT: DUNNE, PATRICK W.
APPLICANT: PIEDRAHITA, JORGE
                                                                                                                                                                                                                                                                                                                                                                                                                                                    Query Match
Best Local Similarity
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Best Local S
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SEQ ID NO 22
                                                                                                                                                                                                                                                                                                                                                                                                                                         Matches
           APPLICANT: FRANCIONE, Blas
APPLICANT: WISNIEWSKI, Thomas
APPLICANT: WISNIEWSKI, Thomas
APPLICANT: SIGURDSSON, Einar
TITLE OF INVENTION: SYNTHETIC IMMUNOGENIC BUT NON-DEPOSIT-FORMING POLYPEPTIDES AND
TITLE OF INVENTION: APPTIDES HOMOLOGOUS TO ANYLOID BETA, FRION PROTEIN, AMYLIN,
TITLE OF INVENTION: ALPHA-SYNUCLEIN, OR POLYGLUTAMINE REPEATS FOR INDUCTION OF AN
TITLE OF INVENTION: IMMUNE RESPONSE THERETO
FILE REFERENCE: 5986/1K434US1
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        CURRENT APPLICATION NUMBER: US/09/823,494
CURRENT FILING DATE: 2001-03-30
PRIOR APPLICATION NUMBER: 09/128,450
PRIOR FILING DATE: 1998-08-03
NUMBER OF SEQ ID NOS: 29
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         TITLE OF INVENTION: TRANSGENIC ANIMALS RESISTANT TO TRANSMISSIBLE TITLE OF INVENTION: SPONGIFORM ENCEPHALOPATHIES
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                            APPLICANT: Chabry, Joelle
APPLICANT: Priola, Susette
TITLE OF INVENTION: Inhibitors of Formation
TITLE OP INVENTION: Protein
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        FILE REFERENCE: 50121
CURRENT APPLICATION NUMBER: US/10/301,488A
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                             TYPE: PRT
ORGANISM: Ovis aries
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                   APPLICANT: Chesebro, Bruce
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Caughey, Byron W
                                                                                                                                                                                                                                                                                                                                                                                                                                      Conservative
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                                           95.5%;
                                                                                                                                                                                                                                                                                                                                                                                                                                      0; Mismatches
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Pred. No. 7.8e-15;
                                                                                                                                                                                                                                                                                                                                                                                                                                                           Score 216; DB 13;
Pred. No. 7.8e-15;
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Sequence 11, Application US/10410907A

Publication No. US20030215880A1

GENERAL INFORMATION:
APPLICANT: Dennis R. Burton
APPLICANT: Gianluca Moroncini
TITLE OF INVENTION: WOIF-GRAFTED HYBRID POLYPEPTIDES AND
TITLE OF INVENTION: USES THEREOF
FILE REFERENCE: 22908-1229
CURRENT APPLICATION NUMBER: US/10/410,907A
CURRENT FILING DATE: 2003-04-08
FRIOR APPLICATION NUMBER: 60/371,610
FRIOR APPLICATION NUMBER: 60/371,610
FRIOR FILING DATE: 2002-04-09
NUMBER OF SEQ ID NOS: 36
SOFTMARE: FRStSEQ for Windows Version 4.0
LENGTH: 256
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; ORGANISM: Ovis sp.
US-10-105-616-5
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US-10-105-616-5
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Matches
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SOFTWARE: Patentin version 3.1
SEQ ID NO 5
LENGTH: 256
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LENGTH: 256
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TITLE OF INVENTION: Vectors for Telomerizing Nuclear Donor Cells and Improving the B TITLE OF INVENTION: Of Nuclear Transfer FILE REFERNCE: 732/002
CURRENT APPLICATION NUMBER: US/10/105,616
CURRENT FILING DATE: 2003-01-31
PRIOR APPLICATION NUMBER: US Provissional Application 60/277,749
PRIOR FILING DATE: 2001-03-21
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          APPLICANT: Geron Corporation
APPLICANT: Clark, A. J.
APPLICANT: Denning, Chris
APPLICANT: Cui, Wei
APPLICANT: Zhao, Debbiao
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                SOFTWARE: PatentIn version 3.1
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                               TYPE: PRT
ORGANISM: Sheep
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                              Y Match 88.5%;
Local Similarity 95.5%;
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42; Conserv
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ilarity 95.5%;
Conservative
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Pred. No. 7.8e-15;
0; Mismatches 0;
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Pred. No. 7.8e-15;
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GENERAL INFORMATION:
APPLICANT: Dennis R. Burton
APPLICANT: Gianluca Moroncini
TITLE OF INVENTION: MOTIF-GRAFTED HYBRID POLYPEPTIDES AND
TITLE OF INVENTION: USES THEREOF
FILE REFERENCE: 22908-1229
CURRENT APPLICATION NUMBER: US/10/410,907A
CURRENT APPLICATION NUMBER: US/10/410,907A
CURRENT FILING DATE: 2003-04-08
PRIOR APPLICATION NUMBER: 60/371,610
PRIOR FILING DATE: 2002-04-09
NUMBER OF SEQ ID NOS: 36
SOFTWARE: FASCEQ for Windows Version 4.0
SEQ ID NO 12
SEQ ID NO 12
LENGTH: 256
TYPE: PRT
ORGANISM: Ovis aries (Sheep)
FRATURE:
NAME/KEY: VARIANT
LOCATION: 171
OCTHER INFORMATION: R to Q
US-10-410-907A-12
                                           FILE REFERENCE: 1700.0290003

CURRENT APPLICATION NUMBER: US/10/346,190

CURRENT FILING DATE: 2003-01-17

PRIOR APPLICATION NUMBER: 60/396,590

PRIOR FILING DATE: 2002-07-18

PRIOR APPLICATION NUMBER: 60/393,725

PRIOR FILING DATE: 2002-07-08

PRIOR PILING DATE: 2002-07-08

PRIOR FILING DATE: 2002-07-08

PRIOR FILING DATE: 2002-07-08

PRIOR FILING DATE: 2002-06-20

PRIOR APPLICATION NUMBER: 60/389,898

PRIOR APPLICATION NUMBER: 607/1802/00166

PRIOR FILING DATE: 2002-01-21

PRIOR FILING DATE: 2002-01-21
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US-10-410-907A-11
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Best Local :
NUMBER OF SEQ ID NOS:
               PRIOR APPLICATION NUMBER: 10/050,902
PRIOR FILING DATE: 2002-01-18
                                                                                                                                                                                                                                                         APPLICANT: Maurer, Patrick
APPLICANT: Pellicioli, Erica
APPLICANT: Renner, Wolfgang A.
TITLE OF INVENTION: Prion Protein Carrier-Conjugates
FILE REFERENCE: 1700.0290003
CHERRENT ADDITON NATURE
                                                                                                                                                                                                                                                                                                                                          APPLICANT: Bachmann, Martin
APPLICANT: Maurer, Patrick
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les 42; Conserva
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To. US20030215880A1
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Pred. No. 7.8e-15;
0; Mismatches 0;
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Pred. No. 7.8e-15;
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RESULT 13
US-10-301-448-28

US-10-301-448-28

Sequence 28, Application US/10301448

Publication No. US20040095964A1

GENERAL INFORMATION:
APPLICANT: FRANGIONE, Blas
APPLICANT: WISNIEWSKI, Thomas
APPLICANT: SIGURDSSON, Einar
TITLE OF INVENTION: PEPTIDES HOMOLOGOUS TO AMYLOID BETA, PRION PROTEIN, AMYL
TITLE OF INVENTION: ALPHA-SYNUCLEIN, OR POLYGULTAMINE REPEATS FOR INDUCTION
TITLE OF INVENTION: IMMUNE RESPONSE THERETO
FILE REFERENCE: 5986/1K434USI
CURRENT PEPLICATION NUMBER: US/10/301,448
CURRENT FILING DATE: 2003-02-21
PRIOR APPLICATION NUMBER: US 60/331,801
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                          APPLICANT: Bachmann, Martin
APPLICANT: Maurer, Patrick
APPLICANT: Maurer, Patrick
APPLICANT: Maurer, Patrick
APPLICANT: Pellicioli, Erica
APPLICANT: Renner, Wolfgang A.
TITLE OF INVENTION: Prion Protein Carrier-Conjugates
FILE REFERENCE: 1700.0290003
CURRENT APPLICATION NUMBER: US/10/346,190
CURRENT FILING DATE: 2003-01-17
PRIOR APPLICATION NUMBER: 60/396,590
PRIOR FILING DATE: 2002-07-08
PRIOR FILING DATE: 2002-07-08
PRIOR FILING DATE: 2002-07-09
PRIOR FILING DATE: 2002-06-20
PRIOR FILING DATE: 2002-06-20
PRIOR APPLICATION NUMBER: 60/389,898
PRIOR APPLICATION NUMBER: PCT/IB02/00166
PRIOR APPLICATION NUMBER: PCT/IB02/00166
PRIOR APPLICATION NUMBER: 10/050,902
PRIOR APPLICATION NUMBER: 10/050,902
PRIOR FILING DATE: 2002-01-18
NUMBER OF SEQ ID NOS: 164
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US-10-346-190-88
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US-10-346-190-88
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; ORGANISM: Sheep PRP
US-10-346-190-81
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SEQ ID NO 88
LENGTH: 256
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Best Local Similarity
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                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                Sequence 88, Ap
Publication No.
                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       SOFTWARE: PatentIn version
SEQ ID NO 81
LENGTH: 256
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Best Local Similarity
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ilarity 95.5%;
Conservative
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Pred. No. 7.8e-15;
0; Mismatches 0;
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Pred. No. 7.8e-15;
0; Mismatches 0;
                                                                                                                                                        BUT NON-DEPOSIT-FORMING POLYPEPTIDES AND FO AMYLOID BETA, PRION PROTEIN, AMYLIN,
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; NUMBER OF SEQ ID NOS: 55
; SOPTWARE: Patentin version 3.1
; SEQ ID NO 28
; LENGTH: 256
; TYPE: PRT
; ORGANISM: Sheep
US-10-301-448-28
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APPLICANT: Jeffrey, Martin
TITLE OF INVENTION: Diagnostic method
FILE REFERENCE: CG/P/135/WOD
CURRENT APPLICATION NUMBER: US/10/479,218
CURRENT FILING DATE: 2003-12-01
PRIOR APPLICATION NUMBER: GB 0113156.4
PRIOR FILING DATE: 2001-05-31
NUMBER OF SEQ.ID NOS: 20
SOFTWARE: Patentin version 3.1
SEQ ID NO 1
LENGTH: 256
TYPE: PRT
ORGANISM: Ovis aries
US-10-479-218-1
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US-10-479-218-6
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                                                                                                                              ; TYPE: PRT
; ORGANISM: Ovis aries
US-10-479-218-6
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Publication No. US20040171082A1
GENERAL INFORMATION:
APPLICANT: The Secretary of State for Environment, Food & Rural Affairs (DEFRA)
APPLICANT: Jeffrey, Martin
TITLE OF INVENTION: Diagnostic method
FILE REFERENCE: CG/P/135/WOD
CURRENT APPLICATION NUMBER: US/10/479,218
CURRENT FILING DATE: 2003-12-01
PRIOR APPLICATION NUMBER: GB 0113156.4
PRIOR FILING DATE: 2001-05-31
NUMBER OF SEC IN NOC. 20
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SOFTWARE: PatentIn version 3.1
SEQ ID NO 6
LENGTH: 256
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Publication No. US20040171082A1
GENERAL INFORMATION:
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Best Local Similarity 95.9
Matches 42; Conservative
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                                        Query Match 88.5%;
Best Local Similarity 95.5%;
Matches 42; Conservative
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Best Local Similarity
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1 GGGGWGQGGSHSQWNKPSKPPKTNMKHVAG-AAAGAVVGGLGGY 43
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95.5%; Pred. No. 7.8e-15;
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95.5%; Pred. No. 7.8e-15;
tive 0; Mismatches 0; Indels
                                      Score 216; DB 16; Length 256; Pred. No. 7.8e-15; 0; Mismatches 0; Indels
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Search completed: March 4, 2005, 11:10:21 Job time: 1334 secs

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